Detailed deck plans for common starships that ply the space lanes for trade, profit, and combat action within and without the Imperium. Plus, High Guard statistics for each starship.

Ideal for supplementing Traveller adventures, handling starship encounters, and supplying characters with starships for campaigns.

Supplement 7
Traders and Gunboats

TRAVELLER®

Science-Fiction Adventure in the Far Future

Game Designers' Workshop

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Traders and Gunboats

TRAVELLER

Science-Fiction Adventure in the Far Future

Game Designers' Workshop

This supplement contains starship and small craft ship designs, deck plans, and background material. The overall concept of the booklet was designed and produced by Marc W. Miller. The deck plan drawings were executed by Chris Purcell. Design assistance was provided by Frank Chadwick, John Harshman, and Loren Wiseman.

Artist's conceptions of the scout/courier (page 9), the express boat (page 12), the express boat tender (page 17), and the subsidized merchant (page 20) are by William H. Keith, Jr.

The original design of the system defense boat and the artist's conception of it on page 37 is by Bob Liebman.

The original design of the close escort is by Frank Chadwick. A substantially different version of the close escort originally appeared in the Journal of the Travellers' Aid Society, Issue No. 4. Artist's conception of the close escort by Richard Hentz.

Traders and Gunboats
Traveller, Supplement 7

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6 7 8 9 10 11 12 13 14 15

This book is a supplement to the rules in **Traveller,**
GDW's science-fiction role-playing game set in the far future.

Game Designers' Workshop,
203 North Street,
Normal, Illinois 61761

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Introduction

With interstellar and interplanetary traffic at levels consistent with the trade and commerce that takes place in a star-spanning civilization, the incidence of ship encounters will undoubtedly be high. More importantly, encounters with such starships will entail more than sightings and conversations; boardings, courtesy visits, inspections, and other dealings may be called for.

STARSHIP ENCOUNTERS

This supplement is intended to address the question of starship encounters through the description of common starships, their interior layouts, and other information.

This supplement is divided into seven distinct sections.

1. Starship Plans and Interiors. This section deals with the basic assumptions used in the generation of starship deck plans and with the reasoning behind the general information presented in later sections.

2. Scouts. This section covers three ships in the Scout Service communications network that spans the Imperium: the type X Express Boat, the type XT Express Boat Tender, and the type S Scout/courier. These three ships are sufficient to provide a highly efficient communications network in any interstellar civilization.

3. Trading Ships. This section covers three merchant starships which are likely to be encountered in star systems: the type A2 Far Trader, the type R Subsidized Merchant (sometimes called the Fat Trader), and the type J Seeker, an asteroid prospecting ship. All are generally engaged in some form of commerce.

4. Gunboats. This section covers two armed ships commonly occurring in star systems within the Imperium: the type CE Close Escort and the type SB System Defense Boat. Their purposes (in addition to armed violence) are covered in the individual ship descriptions.

5. Small Craft. Four typical small craft (cutter, pinnace, ship's boat, and launch) are covered in this section.

6. High Guard Data. Ships in this supplement are produced (as indicated in the individual ship descriptions) using the starship design rules from either Book 2, *Starships,* or Book 5, *High Guard.* All, however, have been rated to produce Universal Ship Profiles and supporting data from *High Guard.*

***7.* Encounters.** This section delineates a table and describes its implementation to allow starship encounters with the ships in this supplement. In addition, this table deals with reasons behind such encounters, reasons such as drive failure, derelict ships, piracy, customs checks, courtesy visits, and others.

Using This Supplement: The deck plans and background information in this supplement can be used to enrich any **Traveller** campaign. Some ships may prove best adapted to actual use by the player-characters as they adventure through the Imperium. Others may be best used as casual encounters. It is recommended that one ship be reserved by the referee for use in a full blown adventure; perhaps the express boat tender can be used as a pirates' corsair, or the seeker in a prospecting expedition.

Starship Deck Plans

The creation of starship deck plan data is based on the the assumption that one ton of mass displacement equals fourteen cubic meters. The starship displacement ton is derived from the volume of one ton of liquid hydrogen, the material used as fuel for starships.

Since the square grid scale used for deck plans is 1.5 meters squares, a ceiling height of three meters means that two floor squares, extended floor to ceiling equals four 1.5 meter cubes or about 14 cubic meters (1.5x1.5x1.5x4=13.5 cubic meters), or one ton. If a 100-ton ship were mapped as a one-level square, it would have two hundred grid squares within.

Allowances of approximately 10% (plus or minus) were made in most areas to allow for proper access and representation of specific items within the ship. For example, crew quarters call for four tons per person (in Book 2); the actual tonnage allocated to staterooms stands at less than that, but the remaining area is take up in communal facilities such as galley, mess, and recreation lounges.

In addition, a limited volume of passages has been added to some starships. Passages and access ways which have no other use may be safely added to a ship without affecting its volume or displacement for construction purposes; such additional passages should amount to no more than an additional 10% of the total ship volume.

INTERIOR DETAILS

The specific interior fittings for ships have been standardized, and are shown on the deck plan symbols chart and on many of the individual ship plans as well.

Interior Walls: Interior walls are partitions: non-load-bearing panels firmly fixed in place. They are not pressure-tight, and cannot withstand a concerted assault. Firing 100 hit points at such a wall with an energy weapon will burn a hole in the wall large enough for one person to pass through per turn; an explosion which produces 100 hit points will produce the same effect. Weapons firing bullets are less efficient in doing this sort of damage; such a weapon must produce 1000 hit points before a person-sized hole is produced.

Sliding Doors: Set in interior walls are sliding doors. Such doors save space over conventional swinging doors, and so are standard on most starships. They are not air-tight, and and serve merely as privacy screens. They may be broken down by weapons in the same manner as interior walls.

Sliding doors are powered, and open com-

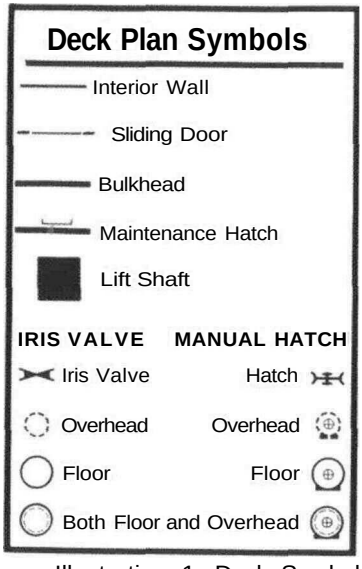


Illustration 1- Deck Symbols.

pletely (assuming ship power is on) when a stud is pressed on the wall next to the door. Illustration 2— Portals shows a sliding door as door C. The stud to open the door is shown on the wall next to the door. Such doors may be locked (from the other side, from both sides, or from the computer) and a red light shows on the stud panel to indicate this fact.

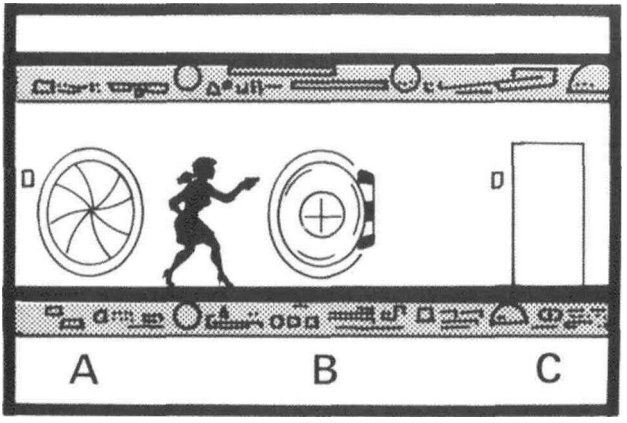


Illustration 2— Portals. Shown are iris valve (A), manual hatch (B), and sliding door (C).

When ship power is off, sliding doors will not operate automatically, but they may be overridden manually with brute force (generally 10 strength points or more applied; pry bar allows DM +4.

Bulkheads: The major structural components of a ship are the bulkheads, and they represent the compartmentalization of the ship for damage control and environment maintenance as well as the outer hull of the ship. Bulkheads are very difficult to destroy. A concerted effort with an energy weapon or explosive must produce 1000 hit points of damage in order to create a hole large enough for a person to step through. Bullet firing weapons are ineffective against bulkheads.

All deck floors are assumed to be bulkheads.

Maintenance Hatches: At some points, small, unobtrusive maintenance hatches have been placed in bulkheads to allow repair or service personnel access to machinery or equipment. Maintenance hatches are not commonly used; that is to say, they stand closed and generally ignored nearly all of the time. Only rarely do crew and passengers even recognize their existence.

Maintenance hatches are unpowered, and they lock with a common service key. On most commercial ships, one key fits all maintenance hatches and most officers and senior ratings have such a key. On military ships, such hatches are separately keyed, and only proper personnel have such keys.

Lift Shaft: Elevators lifting personnel or goods between decks are called lift shafts. They consist of a pressure-tight lift car and a shaft extending between decks. Ordinary sliding doors close the shaft when a lift car is not present. The lift car itself is sealed with a sliding door which is pressure-tight.

Between decks, the lift shaft is sealed by pressure doors, maintaining integrity between the decks.

Generally, a lift shaft will have only one lift car. On larger ships (in the 10,000 ton or greater range), there may be a system with several lift cars, branching shafts, and computer controlled lift car availability.

Iris Valves: Iris valves are pressure-tight automatic portals set in bulkheads. Illustration 2— Portals shows an iris valve. It functions much like the iris of a camera; many panels retract into the frame to leave an open passage, or extend to

block the portal with solid metal. Iris valves may be horizontal or vertical. The deck plan symbols chart shows the various combinations possible. Iris valves are operated by pressing a stud on the wall next to the valve. A valve may be locked from either side or by computer, and a red light glows on the indicator panel to indicate this condition. Valves cannot be forced closed if already open.

Valves are very difficult to force open once fully closed. Throw 9+ to force open a closed iris valve; DM +1 if strength 10+, +2 if dexterity 10+, -3 if the person is in vacc suit, +2 if ship power is off, -8 if locked. Gunfire and explosions will simply block the valve tighter. Iris valves close automatically when a pressure difference is sensed between the two sides of the bulkhead. They will not close fully until the valve is clear of any foreign objects (like legs, hands, etc).

Manual Hatches: Cheaper substitutes for iris valves are manual hatches. These are hinged pressure doors secured by a handwheel and extending bars. They are not automatic and have no interaction with the ship's computer (although there may be a sensor which tells the computer if the hatch is open or closed).

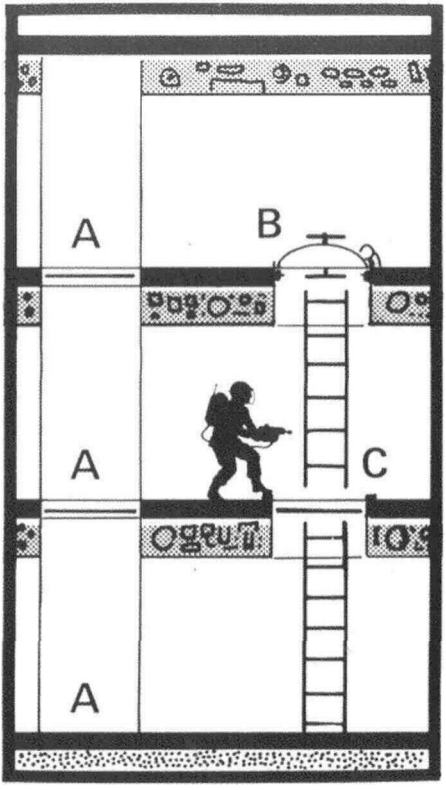


Illustration 3— Vertical Portals. Shown are lift shaft (A), manual hatch (B), and iris valve (C).

INTERIOR CONDITIONS

Normal conditions generally approximate those of a livable world surface.

Light: Most areas are fully and comfortably lighted. The intensity of light can be varied by computer instructions or by simple wall switches. Some areas (such as cargo hold or maintenance ducts) may be poorly lit. Some areas (such as the bridge) may be lit with red light to preserve night vision of personnel assigned there.

Atmosphere: The interior of the ship will normally be pressurized to standard atmosphere with an oxygen/nitrogen mixture. Air locks may be in vacuum or at full pressure depending on ship procedures and who used the lock last.

Temperature: The interior of a normal ship is about 25 degrees C.

Plumbing: On most ships, each stateroom contains sanitary facilities for individuals. On small craft, the vessel usually contains a fresher for use while in flight.

Gravity: Most ships have grav plates built into the deck flooring. These plates provide a constant artificial gravity field of 1 G. Acceleration compensators are also usually installed, to negate the effects of high acceleration and lateral G forces while maneuvering. A ship's passengers would be unable to tell whether they were moving through space or grounded on a planet without looking out a viewscreen.

The Express Boat System

Within the Imperium, the single most important duty of the Interstellar Scout Service is performed by its Communications Office. This office maintains the sprawling express boat network which provides communications between the stars for government, industry, commercial enterprises, and private individuals.

THE EXPRESS BOAT NETWORK

Like the arteries and veins of a body, the express boat network binds the Imperium together by providing worlds with a constant flow of information and communications for official, commercial, and private purposes.

This system has three basic components: the express boat itself, the express boat tender, and the scout/courier. Each performs a different purpose, and each has its own niche to fill within the whole program.

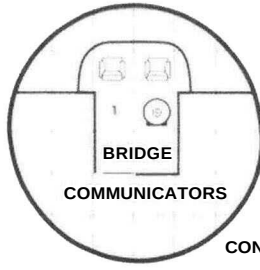
The express boat (also called an xboat) is a small, fast ship filled with a pilot compartment, message data banks, and jump drives. The fit is so tight that there is no room even for maneuver drives. Each is capable of jump-4 (four parsecs per week); it jumps, relays its messages to the station on arrival, and then waits to be picked up by a tender, to be refuelled and sent on its way with a new load of messages. The local station, meanwhile, accepts messages, encodes them, and transmits them to a tender at the edges of the stellar system. Messages brought by the arriving xboat and intended for further down the line are consolidated with the new data and all are sent on to another xboat already fuelled and standing ready to leave. The entire network operates like the pony express — messages are always moving at top speed. Transfer time for messages from one xboat to another can be as short as ten minutes, and is rarely more than an hour.

The express boat tender is responsible for servicing the xboats when they arrive. It constantly roams about the stellar system, picking up newly arrived xboats, refuelling them, performing minor maintenance operations, replacing fatigued pilots, and generally seeing to the welfare of the xboat station. The tender also carries data banks which relay messages to the xboats just before they leave for the next system. It also carries replacement pilots for the xboats.

The scout/courier is the final part of the network, although this type of ship is not restricted to working with the express boat system. The xboat network is a general framework of routes connecting major worlds and population centers with other similar worlds. Economic considerations make it impossible for the network to reach every single world in the Imperium; the scout/courier is used to fill the gaps. When a message can no longer be forwarded by xboat along the major routes, it is transferred to a scout/courier which then carries it to the specific world in question. Main routes are plotted to come within several parsecs of every star system in the Imperium, so the added transit time is rarely more than an extra three or four weeks.

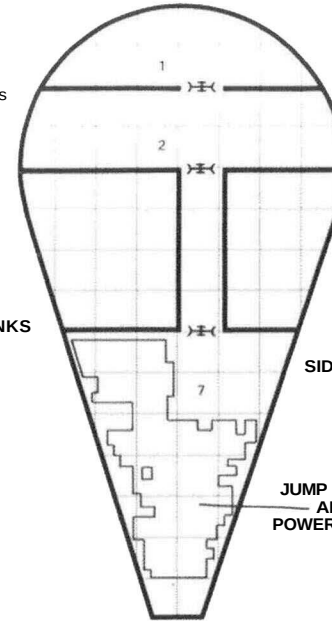
THE EXPRESS BOAT

The express boat is almost useless for any purpose other than that for which it



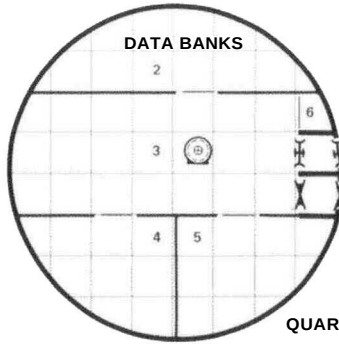
CONTROL DECK

Typical Humans

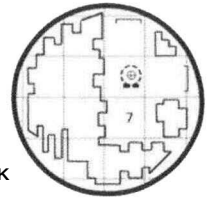


SIDE VIEW

FUEL TANKS



QUARTERS DECK



DRIVE DECK

1.5 meter squares
for use with Snapshot
or Azhanti High Lightning

Deck Plan Symbols

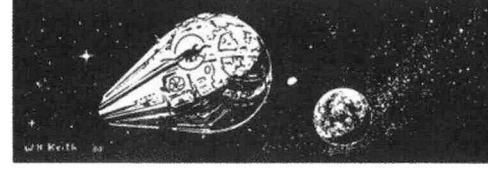
- Interior Wall
- Sliding Door
- Bulkhead
- Maintenance Hatch
- Lift Shaft

IRIS VALVE	MANUAL HATCH
Iris Valve	Hatch
Overhead	Overhead
Floor	Floor
Both Floor and Overhead	

XBOAT - 51216

IMPERIAL INTERSTELLAR SCOUT SERVICE- COMMUNICATIONS BRANCH

Tonnage. 100 tons (standard). 1400 cubic meters.
Dimensions: 12 meter sphere with 10 meter cone rear tail. Overall length equals 22 meters.
Crew; One. Pilot/engineer performs all required operations. Ship can function automatically without any crew.
Acceleration: None. No maneuver drives installed.
Jump: 4. Capable of one jump-4. four jump-1, or any combination totalling four parsecs.
Power Plant: None. Jump drives carry power plant capacities and functions.
Engineering: IISS custom installations.
Gravities: Standard 1G floor field.
Range: One jump-4. Three days.
Cargo: One ton. One passenger possible.
Armament: Unarmed. Scout pilot is provided with small arms in the ship's locker to resist boardings.
Electronics. ISMM Model/1bis. Extensive data banks and communicators for data transmission. Entertainment consoles and educational programs for scout pilot diversion.
Ship's Boats. Rescue ball is available for emergency reentry by scout pilot where necessary. In ordinary circumstances, the express boat is retrieved and refuelled by an xboat tender.



was originally designed — carrying messages from one location to another at the fastest possible speed. Its cramped hull doesn't even have room for maneuver drives; the ship is helpless until picked up by a tender.

Starships can generally expect to encounter express boats in the Imperium's major star systems, specifically those which have scout service communications stations and which are situated on major jump routes. When express boats are encountered off the main routes, the event would be a strong indication of some special Imperial activity or of a mishap with the xboat itself. High population and high technology star systems can be expected to have up to twelve xboats present at one time, probably distributed evenly between arriving and departing ships. Lower population systems will have fewer xboats. The presence of a scout base will increase the probability of xboats being present. Imperial Way Stations, maintained by the scouts to service and overhaul all scout vessels, will have many xboats present, although most will be in some state of disrepair.

Express Boat (Type X): Constructed using the type 100 hull, the express boat is fitted with drives producing jump-4, and nothing else. There is no power plant or maneuver drive installation. Fuel tankage is forty tons, enough for one jump. The standard bridge is complemented by a Model/4 computer, massive communicators, and message data banks. The ship has two staterooms; one is necessary for the single crew member, while the other can carry a passenger. More often, the pilot uses the second room for additional living space. There is a one ton cargo bay which is occasionally used to carry vital cargo such as vaccines or sophisticated repair parts.

The express boat costs MCr70.65 to construct, assuming no architect's fees (the designs are standard and long since amortized) and a 10% discount for production in volume.

Interior Details: The deck plan shows most of the important interior details of the express boat. Dual air locks are mounted side by side on the hull. The hatches are intended as safety back-ups to the powered iris valves. Adjacent to the air locks (at 6) is the ship's locker, containing vacc suit, survival equipment, an inflatable rescue ball, and the ship's only armament, usually a shotgun or submachinegun. Staterooms are positioned at locations 4 and 5, while an open living area is located at 3. The drive room is accessed through a long tube which passes through the fuel tankage. Note the maintenance hatches which provide direct access to the drives from outside and incidentally serve as emergency exits.

Peculiarities: Express boats are not named, at least not officially. Each carries an identifying number. Since pilots are rotated between ships frequently, there is little chance to build any lasting ties to the xboats. However, on the fringes of the Imperium, express service is understandably slower, and some branches of the network tend to keep pilots and xboats together. Names for such boats have been seen in service, and tend to be types of flowers.

The express boat is also capable of only limited endurance. While it can sustain its crew of one and a passenger for the week it spends in jump space, its power, atmosphere, and food reserves are good for only about three days after break-out.

Variants: No known variants of the xboat are actually in regular service. Two variant models have been built for experimental purposes. One model incorporated maneuver drives sufficient to produce 1-G; the loss of jump potential (reduced to jump 3) was deemed unacceptable, however, and it was not produced. The second

variant included a four-ton light sail (replacing the second stateroom). This model was intended to provide emergency acceleration away from a star in the event of breakout at too close a distance. The apparent benefits from this modification were also deemed too small for mass production. However, there are reports that some examples were produced and may be in service in the Spinward Marches.

THE EXPRESS BOAT TENDER

The express boat system would not work without the express boat tender. These tenders, stationed in each system that express boats stop at, serve two purposes. First, they tend express boats, recovering them when they arrive, refuelling them and repairing minor problems, and then sending them on their way. Second, they serve as a relay station between the planetary surface based message center and the express boat itself. Messages are forwarded to the tender for transmittal to the xboat just before it leaves for the next star system.

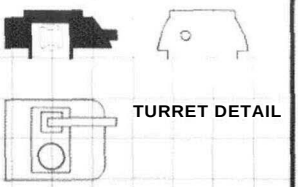
Express boat tenders are encountered anywhere that xboats may be expected. High population, high technology systems will probably have several tenders operating in order to handle the flow of information. Express boat tenders are jump capable, and each may carry up to four xboats in its cavernous ship bay. As a result, the tenders can be found in fringe or off-route systems ferrying extra xboats to areas that need them. They also undertake recovery missions to pick up damaged xboats or boats which have misjumped to off-route systems.

Express Boat Tender (Type XT): Constructed using a type 1000 hull, it is fitted with H model drives, producing jump-1 capability and 1-G acceleration. Fuel tankage is 150 tons; jump requires 100 tons of fuel, but in insystem operation, the ship uses this tankage to refuel express boats instead. The standard bridge is complemented by a Model/3 computer and fire control for three turrets, plus communicator relay facilities. The ship has ten staterooms and twenty low berths. The crew consists of six: a captain/pilot, navigator/medic, communications specialist, and three engineers. Three gunners may be added to the crew where necessary. Additional slots for the crew are taken up by replacement xboat pilots awaiting missions. There is a sixty-ton cargo bay used for repair parts and replacement equipment. Three weapons turrets arm the ship sufficiently to take care of most situations. The major part of the ship (600 tons) is taken up by a cavernous ship bay. This area can accomodate four express boats or two scout/couriers with little or no problem.

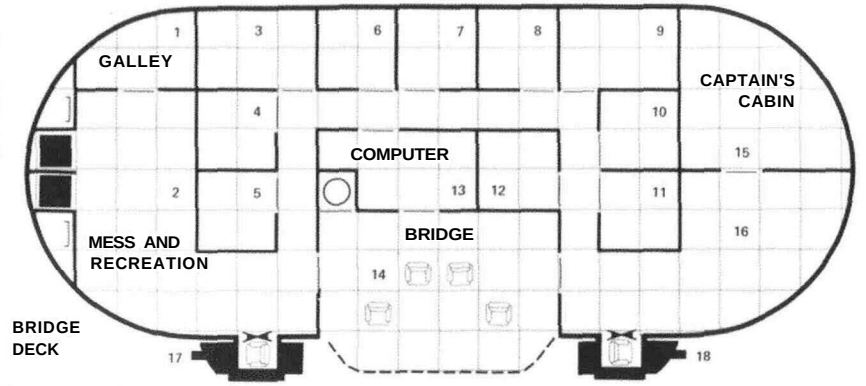
The express boat tender costs MCr274.77 to construct, assuming no architect's fees (the design is standard and any costs have been amortized by the government) and a 10% discount for production in volume. Weapons costs have not been included in this price.

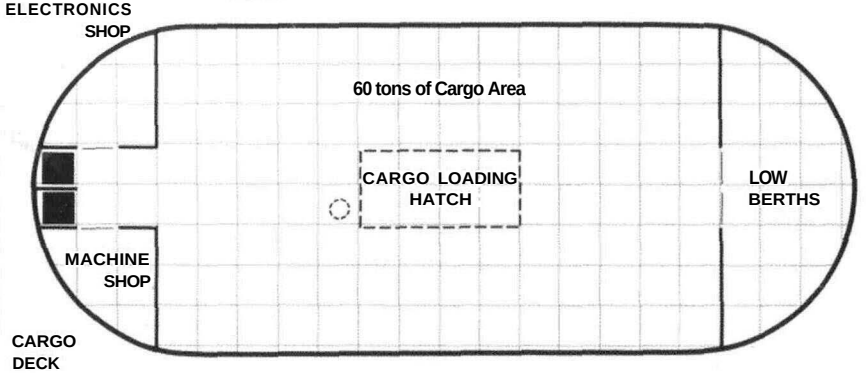
Interior Details: The most striking interior detail for the express boat tender is the ship bay. It measures 40 meters by 28.5 meters by 12 meters; this twelve meter dimension can be expanded to 24 meters through the simple expedient of leaving the ship bay doors open. Any ship or group of ships that can meet this dimensional requirement, up to a total of 600 tons, can be carried by the tender through jump space. Solid frame brackets within the bay are used to secure any ships or cargo to prevent damage while under acceleration. The entire ship bay, with the door closed, can be pressurized to allow access to the exteriors of any ships or boats carried within while avoiding the interfering bulk of vacc suits.

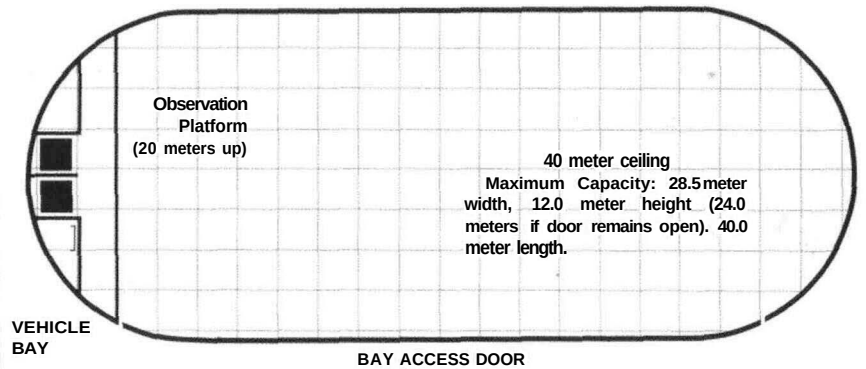
Express Boat Tender



The armament of an express boat tender varies - nearly any type of gun may be placed in the ship's turrets. The turret arrangement, however, is a constant. One pop turret is mounted aft, and can conceal itself in the deck when necessary; two turrets forward are mounted on tracks, and can he moved to whatever part of the ship need protection.



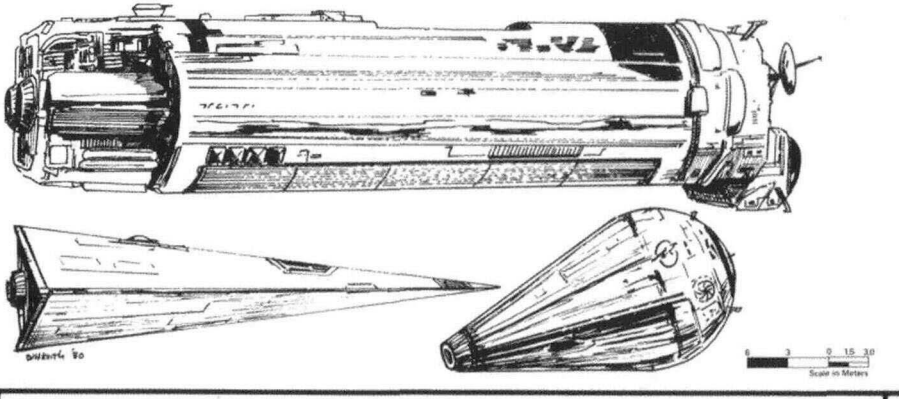


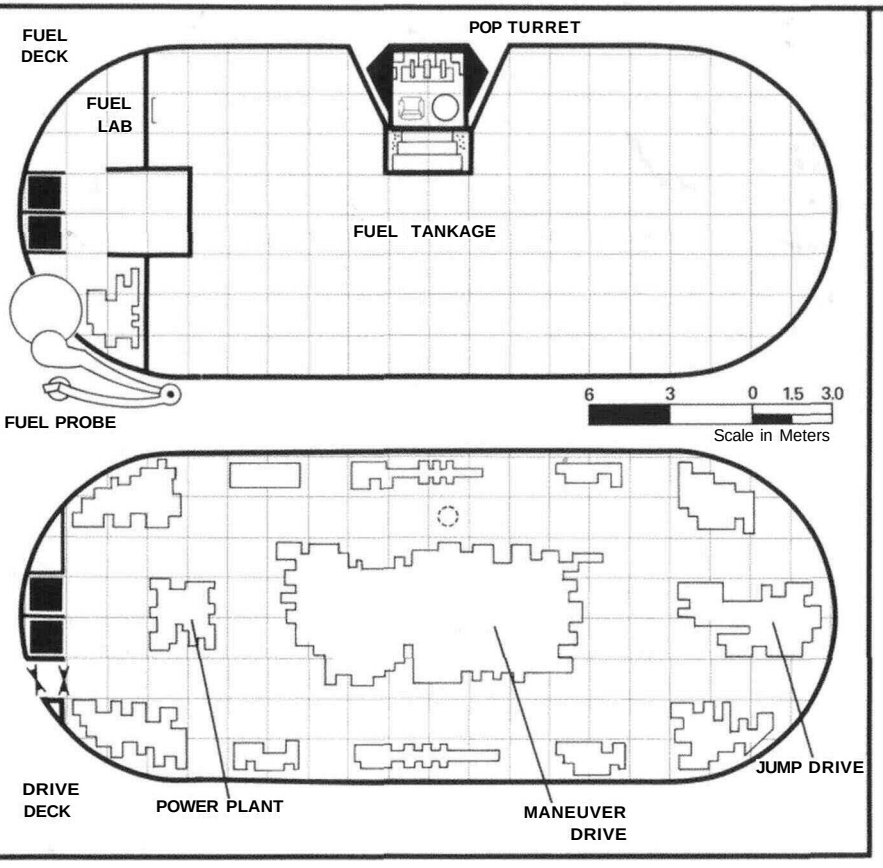

Observation Platform (20 meters up)
40 meter ceiling
Maximum Capacity: 28.5 meter width, 12.0 meter height (24.0 meters if door remains open). 40.0 meter length.
VEHICLE BAY
BAY ACCESS DOOR

EXPRESS BOAT TENDER

The armed express boat tender XT 8/96 *Purcell* is typical of the ships on the Scout Service communications network in the backwaters of the Imperium. Closer to the core, this type of ship would be unarmed. Beyond the imperial border, these ships aren't used; there would be no bases to support them.

Tonnage 1000 tons. 14000 cubic meters.
Dimensions: 60m long. 30m wide. 12m high.
Crew. Six. Captain, pilot/navigator, communications specialist, three engineers. Provision for four xboat pilots.
Performance: 1G. Jump-1. Standard power.
Special Features: Unstreamlined. Heavy duty communications banks. Fuel and maintenance facilities for xboats.





The forward end of the ship bay connects via a large port to the cargo bay of the ship. This cargo bay (of 60 tons capacity) carries consumables for the tender and to replace food and consumables when resupplying express boats.

Low berths for medical cases and spare pilots are situated adjacent to the cargo bay. Also on the cargo level are an electronics repair shop and a machine shop.

The fuel level contains tankage for the ship and for the refuelling of express boats. An external fuel probe allows fast refuelling of express boats without taking them into the ship bay or requiring crew to don vacc suits. A fuel lab on the tankage level monitors fuel quality. The lowest level of the ship is the drive deck with all jump drives, maneuver drives, and the main power plant. An air lock allows access to the exterior from this end of the ship.

Note the two lift shafts which run the length of the ship. The duplication allows faster access when one shaft is already in use, and provides damage control in the event of combat or disaster.

The bridge deck, located extreme forward, contains crew quarters and the controls for the ship. The bridge itself includes a bay window providing visual scanning of the ship bay doors and an overhead view. Surrounding the bridge are individual crew staterooms (capable of double occupancy when necessary). A communal fresher facility (location 12) allows more room in each stateroom, and decreases total costs for the ship.

Weaponry: The armament for the ship is unusual in that the types of turrets used are not standard. Forward, two tracked turrets are accessible through iris valves adjacent to the bridge. Once a gunner is inside, the turrets may be moved along tracks on the circumference of the hull. This arrangement allows positioning of the gunnery turrets for the best possible shot. Normally, such arrangements are not necessary, but this type of tender is often occupied with a mission to recover a specific ship or express boat, and cannot maneuver while doing so. Instead, the turrets themselves may maneuver.

Aft, a different arrangement dictates installation of a pop turret. Although the pop turret cannot maneuver, it can retract into an armored citadel in the event of enemy fire, rising above the line of the hull only to deliver its own fire.

Peculiarities: The weaponry of express boat tenders varies wildly depending on what particular armament was available at the time of construction. Thus, it is difficult to predict what type of guns or launchers will be encountered on any specific tender. Further, although the tracked turrets are a reasonable idea for the situation they are intended to cope with, they are also poorly equipped to handle many other situations. As a result, any weapons on express boat tenders can be expected to fire at -1 at all times.

Although essentially unstreamlined, the tender is aerodynamic enough to allow fuel skimming from gas giants, thus making acquisition of hydrogen fuel a matter of only minor importance.

Variants: Three known model variations exist for the express boat tender.

Bulk Ore Carrier: Several examples of the ship were constructed with the large ship bay fitted to carry bulk ore from asteroid belts to surface refinery plants. The model has a limited use, because the system must have both a producing asteroid belt and a refinery plant established on an airless world.

Fuel Tanker: The Imperial Navy has acquired approximately one hundred and forty-four ships with the central bay converted to carry starship fuel. The total

capacity of 750 tons of fuel makes the ship an ideal nursemaid to fighters patrolling frontier systems.

Corsair: The third variant of the tender is altogether unofficial. Express boat tenders are a prime target for hijackers. The tenders make excellent corsairs, especially if upgunned. Typically, a tender will be surprised and hijacked by a band of thugs, often feigning shipwreck in order to attract the ship's attention. If they are lucky, the tender will have with it a scout/courier or a couple of xboats, which are then used to make the tender look more realistic when it plies the space lanes. The large ship bay allows most smaller ships to be enveloped and then boarded at the pirate's leisure.

THE SCOUT/COURIER

One of the most common starships within the Imperium is the tested and tried type S scout/courier. Originally produced to specification for the Imperial Interstellar Scout Service, this sleek and simple ship was intended for common courier duties within the Imperium, and simple survey and exploration duties beyond the Imperial borders.

While the xboat system provides fast forwarding of messages and information along the major xboat routes within the Imperium, it falls to the Scout Service's fleet of scout/couriers to relay information from worlds along the routes to outlying fringe worlds. The jump-2 capability of the scout/courier places nearly all such worlds within its range.

Beyond the Imperial borders (and in relatively unexplored regions within the Imperium) the scout/courier is pressed into service as an exploratory vessel. It can roam through most areas, refuelling itself from gas giants or planetary oceans as necessary, checking up on local conditions, and filing reports when it returns from a mission. In some areas, an exploratory cruiser of perhaps 10,000 tons will carry a squadron of ten or more scout/couriers. As the cruiser passes through an area, individual scout/couriers will range ahead or to the flanks and perform actual data gathering missions.

Because the scout/courier is a standard design, the Scout Service has a large quantity of the vessels on hand, with the natural result that some are sold at surplus and find their ways into private or commercial hands, while others are scrapped. In addition, however, many are diverted to a scout program called detached duty. Under the direction of the Scout Service's Detached Duty Office, some former or retired scout personnel are provided with scout/couriers for their own use. The ships are too small for profitable commercial operations, but they do serve as a form of reasonable transport for those with wanderlust. In addition, the Scout Service derives a reasonable intelligence return on its investment through the examination of the ships' logbooks when they are serviced, and through routine interrogation and debriefings of crews. Finally, such detached duty scout/couriers are subject to recall and activation (with crew) in the event of a war scare or mobilization alert.

Scout/Courier (Type S): Using the type 100 hull, the scout/courier is equipped with four staterooms (allowing a total of eight passengers and crew if double occupancy is assumed), but there are no low berths. The crew consists of a pilot who also doubles as navigator, engineer, and gunner; additional crew members to fill these slots may be hired on as desired. The ship has jump drive A, maneuver

drive A, and power plant A, producing a performance of jump-2 and 2-G acceleration. The bridge has a computer Model/1bis (with a standard software package) and one ton of fire control space allocated to the ship's single hardpoint. The ship is fitted with a dual turret; the weaponry installed varies with the specific ship. The ship has a specially fitted hold which carries a single air/raft; there is a separate three-ton cargo hold. The hull is streamlined for atmospheric landings, and fuel scoops allow local refuelling from oceans or gas giants.

Total fuel tankages is 40 tons. Base price to the government for a scout/courier is MCr27.63, which includes savings based on standardized designs. Architect's fees are not necessary, as they were amortized long ago.

Weaponry: The actual weaponry carried on the scout/courier varies with the mission accorded the ship. Couriers generally mount a single laser and a single missile rack. Exploratory scouts mount two missile racks. Detached duty scout/couriers are provided without weaponry, but the crew generally acquires some sort of firepower in a short time.

Interior Details: The deck plan indicates the interior layout for the typical scout/courier. The staterooms (4, 5, 6, and 7) are large and spacious, an essential consideration when the crew may be forced to spend long hours together. The common area (8) contains recreation equipment, a galley, and eating facilities. The rear section (13) serves many purposes; on scouts, it carries laboratory and sensor equipment; on couriers, it carries communication equipment and data banks; on detached duty ships, it is cleared out and become a lounge for the crew. The forward cargo compartment (20) carries three tons of cargo, and is accessible from just behind the bridge, or from outside. The upper gallery contains the gunnery position (16), a storage area (18) much like an attic, and a forward sensor position (19). The void spaces within the hull (9) contain fuel, pumps, and other equipment. Two specific areas (10) contain the landing feet for the ship, including retraction equipment.

Peculiarities: The major fault of the type S scout/courier is its air system. Although of respectable quality for life support, it begins to smell after about three weeks of use. Thereafter, the smell becomes increasingly obnoxious, and most crew members find the smell intolerable after six weeks. The problem can be corrected by flushing the air system, which operation costs Cr1,000 for parts and components. Temporary respite may be obtained (for about a week) by replacing the system's air filters (at Cr200). Both these processes also require a plentiful supply of breathable air. Instead, the entire air system may be replaced with a better model; it costs Cr70,000 and requires sacrificing one ton of cargo space.

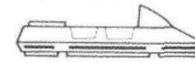
Costs: A new type S scout/courier, direct from the builder, costs MCr27.63. Using a standard financing arrangement, a down payment of MCr5.53 would be made, with monthly payments of Cr132,600 for 480 months following.

Surplus scout/couriers can generally be had for MCr15 to MCr18, but those prices are for cash, and financing is difficult to obtain for such used vessels.

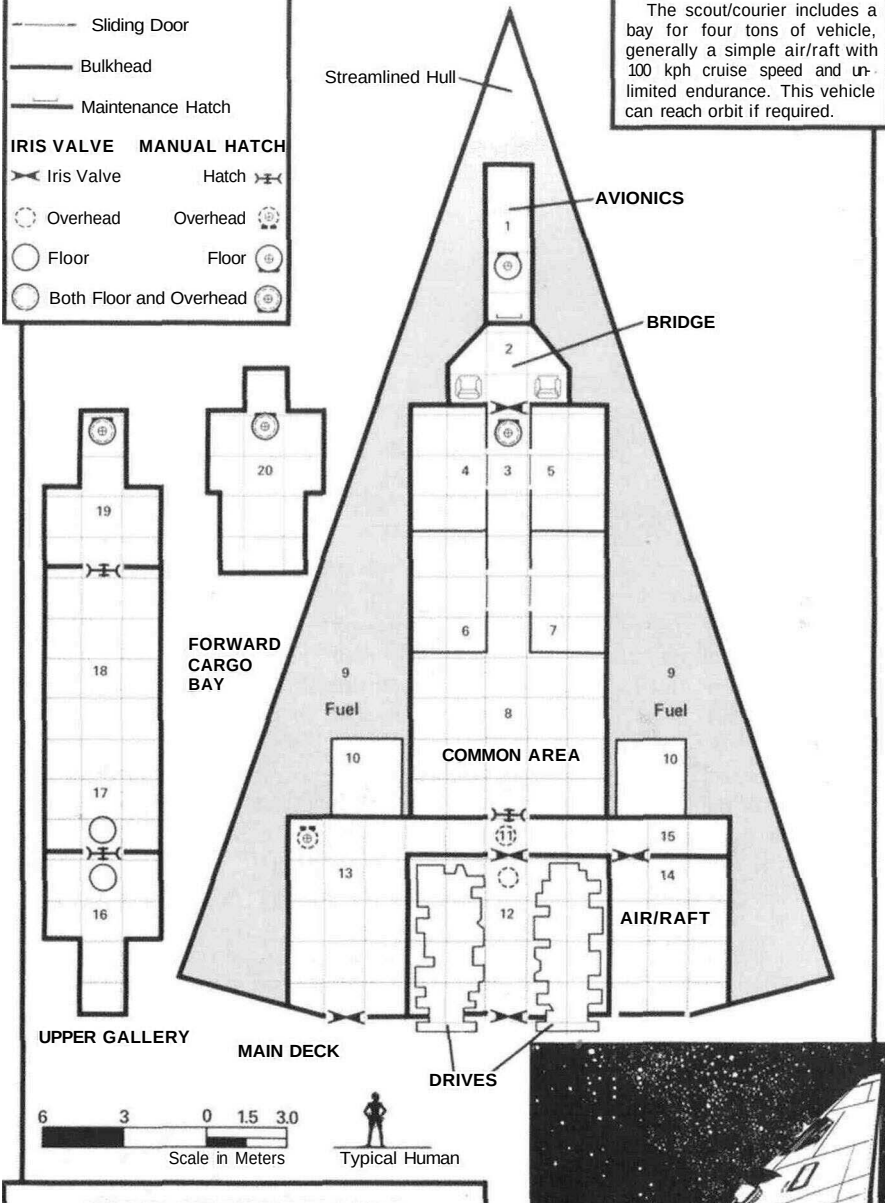
Deck Plan Symbols

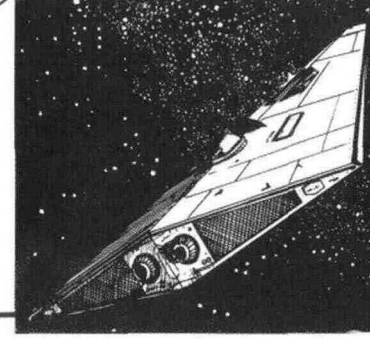
- Interior Wall
- Sliding Door
- Bulkhead
- Maintenance Hatch

IRIS VALVE	MANUAL HATCH
Iris Valve	Hatch
Overhead	Overhead
Floor	Floor
Both Floor and Overhead	



The scout/courier includes a bay for four tons of vehicle, generally a simple air/raft with 100 kph cruise speed and unlimited endurance. This vehicle can reach orbit if required.





IMPERIAL SCOUT/COURIER (Type S)

Tonnage: 100 tons (standard). 1400 cubic meters.
Dimensions: Maximum— 37.5 m by 24 m by 7.5 m.
Drives: Jump 2. 2G. Power plant 2.
Crew: One person may operate the ship. Facilities for four; eight with double occupancy.
Cargo: Three tons.
Armament: One hardpoint dorsal. Weaponry varies.

Traders

There are many reasons given for the exploration of space, and for the colonization of worlds and star systems. Regardless of any of the supposed reasons, the real and final reason is trade. Initially, the exploration is in search of new resources; once areas are settled or new races are encountered, then commerce and the search for new or lucrative markets takes over. Interstellar trade and commerce may depend on hundred-thousand ton transports in some regions, but ultimately, trade involves a range of ships from the very smallest to the very largest.

TRADE BETWEEN THE STARS

Trade within the Imperium is carried on at several levels: large scale trade in resources and finished goods, subsidized trade to increase the interchange of technology, and free trade by individual merchants.

Large scale trade consists of the flow of basic resources from areas rich in them to areas which need them. Ore is mined on frontier worlds where the veins are close to the surface or in asteroid belts where the metals are already separated into manageable chunks. After some local refining, the metal or basic compounds are shipped to other star systems where they are used in industry. Or organic materials which are easier gathered than synthesized may be discovered and mined (for example, oil for lubricants or rare plants for drugs). In either case, the ultimate profit is derived from the fact that it is cheaper to transport the raw materials parsecs than to mine or synthesize them locally. Large scale trade is a two way flow The industry that uses the raw materials ships finished goods back to the areas that sent the raw materials. In either case, large scale trade calls for large scale ships to carry it out. Such trading ships are generally huge bulk carriers with displacements in the multi-kiloton range.

Subsidized trade is the result of government policies. A simple profit and loss analysis of interstellar trade on a small scale can prove it unprofitable. The costs of the ship, crew, goods, and fuel may well exceed the potential sale price of the goods carried. The result is no trade; no imports or exports; no markets off world. Local governments may come to the conclusion that there are other benefits to off world trade than can be seen on a mere balance sheet. They may determine that the benefits of offworld technology can help their own world in its development. Local population, once aware of what can be had, may then develop it by itself, cheaper, and while providing local jobs. Local resources meanwhile may be sold off world to produce needed hard currency. For whatever the reason, the local government may elect to provide subsidies which will assist in the creation of interstellar trade routes. The ultimate plan, in such cases, is that eventually such trade will pay for itself.

Free trade is the most widespread type of interstellar commerce. Individual starships purchase goods on a speculative basis, carrying them and absorbing freight costs until the goods are sold. Such free trade practices are even possible without a starship, but most are carried out by the small tramp ships that wander from system

to system, theoretically buying goods at low prices and selling them at high prices. Those which buy high and sell low don't stay in business for very long.

THE SUBSIDIZED MERCHANT

In subsidized commerce, a local government (or a group of several worlds) will agree to subsidize the construction of a commercial starship in return for its servicing an established route. Ideally, the route will be a profitable one, and the subsidy can soon be ended. But, even without profits, the route provides a channel for interstellar trade, producing markets for resources and finished goods alike, and acquainting the peoples of all the worlds with the higher technology or better quality that is possible. Whether this makes the people ambitious to duplicate the artifacts by their own means or simply makes them disheartened depends on the people themselves.

Typically, a subsidized merchant will establish a route which will attempt to guarantee profits. Individual ports of call may not always provide sales at high margins, but overall on the route, sales can be expected to produce reasonable income.

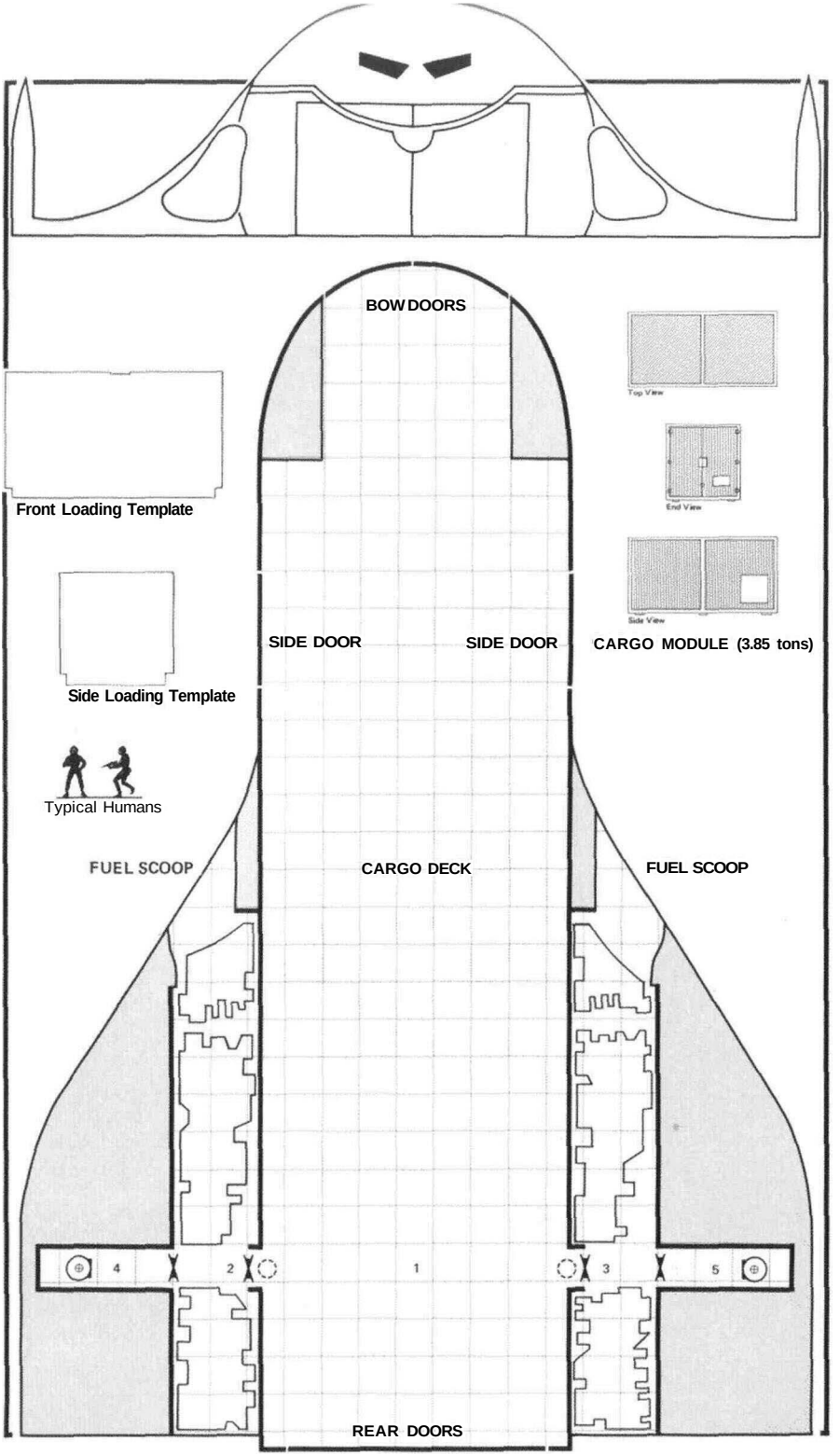
For example, a route may begin with an industrialized world where manufactured goods may be cheaply procured. The first port of call could be a non-industrial world, one which provides an excellent market for the manufactured goods. That world could export raw materials such as radioactives or textiles. The ship then jumps to a rich agricultural world and sells those goods while buying agricultural products. The ship would then make a return journey, again buying goods at low prices, especially those in high demand at the next world. The route needn't even be profitable at each port of call. Sometime, goods might be picked up along the way with the intention of selling them farther down the line, where the captain knows that there is a market.

Finally, the ship can always fall back on carrying cargo and passengers if no worthy cargos are found.

Subsidized Merchant (Type R): Constructed using the type 400 hull, the subsidized merchant is equipped with class C drives capable of producing jump-1, 1-G acceleration, and power plant-1. Fuel tankage is 50 tons, sufficient for one jump, plus some maneuver. Fuel scoops are integral with the hull, and a fuel purification plant allows use of unrefined fuel. The rather ordinary bridge is complemented with a Model/1 computer and two tons of fire control for the ship's two turrets. The ship has thirteen staterooms (five for the crew; eight for high or middle passengers); there are nine low berths. The crew consists of a captain/pilot, navigator, medic, steward, and engineer. There exists the potential for two gunners as crew members if weaponry is installed. The ship carries a 20-ton launch for passenger shuttling and minor errands; it is piloted by the navigator or an engineer. Cargo capacity is 200 tons.

The subsidized merchant costs MCr100.035, including discounts for volume production. This ship is a standard design, and there are no architect's fees.

Interior Details: The subsidized merchant is built on a two level plan. The lower deck contains a full access tunnel-type cargo area adapted to containerized cargo. Each cargo module (of 3.85 tons) can be positioned on the deck and removed through bow, rear, or side doors. The cargo-loading templates show the actual configurations which will pass through the various doors.


BOW DOORS
Top View
End View
Side View
Front Loading Template
Side Loading Template
SIDE DOOR
SIDE DOOR
CARGO MODULE (3.85 tons)
Typical Humans
FUEL SCOOP
CARGO DECK
FUEL SCOOP
4
2
1
3
5
REAR DOORS

Deck Plan Symbols

Interior Wall

Sliding Door

Bulkhead

Maintenance Hatch

IRIS VALVE	MANUAL HATCH
Iris Valve	Hatch
Overhead	Overhead
Floor	Floor
Both Floor and Overhead	

SUBSIDIZED MERCHANT

Tonnage: 400 tons (standard). 5600 cubic meters.

Dimensions: 46.5 meters long by 10 meters high by 15 meters wide. Wingspan: 32 meters.

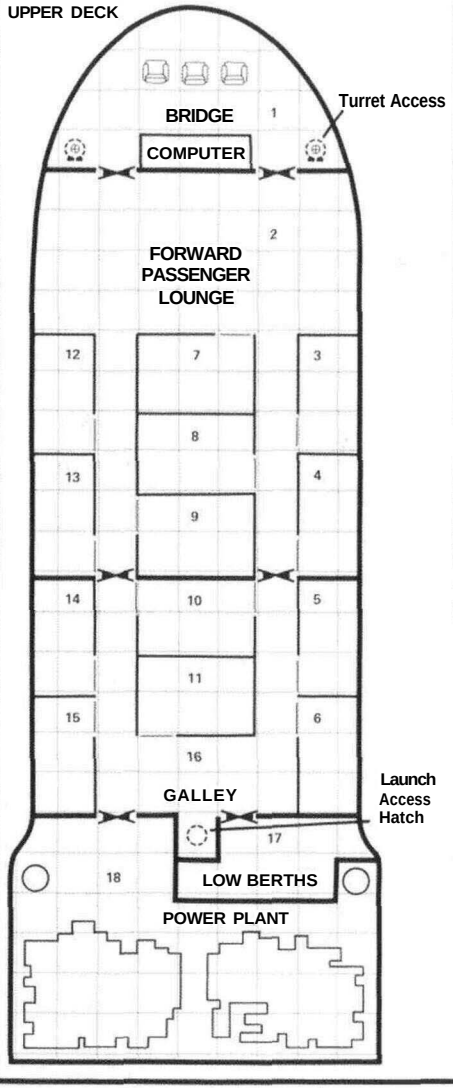
Crew: Five. Captain/pilot, navigator, medic, steward, and engineer. Gunners optional. Staterooms for each.

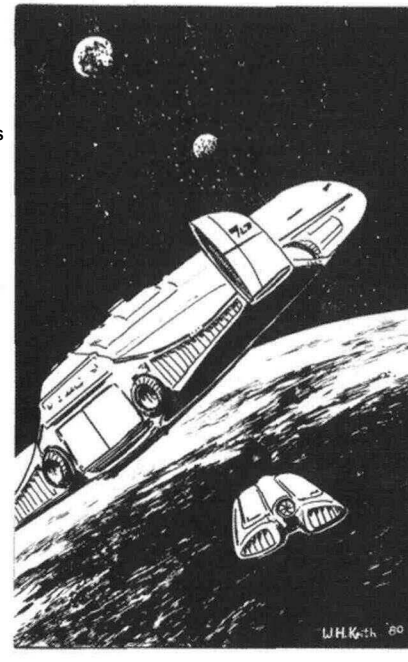
Performance: 1G acceleration. Jump-1. Standard power plant.

Electronics: Model/1 computer with entertainment consoles, navigation screens, and automatic life safety interlocks.

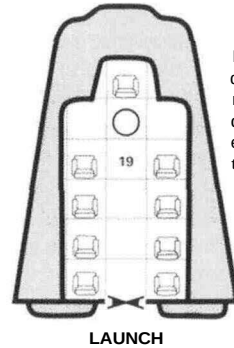
Capacity: 200 tons cargo (generally in standard modules), eight passengers. Nine low berths.

Ship's Boat: Launch mounted dorsally with integral lifeboat capability, the launch is also used for errands and transfers.





1.5 meter squares
for use with Snapshot
or Azhanti High Lightning



Launch mounts on dorsal surface of merchant- dismounts for errands and transfers.

Maneuver Drives Mounted Underneath

The lower level also contains the drives and fuel scoops for the ship's tanks. Fuel is contained in the wings and wing-tips. Small crawlways extend into the wings (locations 4 and 5) for access to the landing legs and for exiting beneath the wings.

The upper level contains passenger and crew staterooms, the lounges, the bridge, and the galley. The rear portion of the upper level contains the ship's power plant and the low berths. The transverse bulkhead midway through the upper level is a pressure barrier designed to reduce losses in the event of a hull puncture.

The type R subsidized merchant is streamlined and capable of landing on world surfaces. It generally does so to load and unload cargo. The ship has articulated landing gear, and once positioned for cargo, the ship can kneel, allowing a straight drive on and drive off with cargo. When the landing gear is fully extended, the ship has excellent ground clearance for takeoffs and for underbody maintenance.

Passenger loading is generally performed using the 20-ton ship's launch. The launch calls at the main starport or even at a local hotel's landing pads and picks up passengers booked for the flight. The ship itself is already in orbit, and the launch mates directly with the berth on the ship's dorsal surface. Passengers then board using the launch access hatch. The launch has provision for eight passengers in addition to the pilot. It can carry 9 tons of cargo.

The launch can also serve as a life boat when necessary.

Costs and Revenues: The monthly payments for a ship of this type amount to Cr416,812. Further expenses for crew, life support, maintenance, and berthing fees amount to Cr82,337 per month, assuming one jump every two weeks. Fuel is free for the skimming at most systems, but would add another Cr5000 per jump if it is required to be purchased. This type of merchant can gross approximately 0546,000 per month, assuming full passenger manifests and a full cargo bay for each jump. A ship owner who depended on full loads for every jump would soon be in trouble.

This ship, however, is a subsidized merchant. The government makes the monthly payments, and also takes 50% of gross receipts. The owner pays all expenses, and thus is responsible for paying the overhead of Cr82,337 per month. The owner also receives half of the gross of up to Cr546,000 per month. In fact, the ship could run at 35% of full load and still make a (small) profit.

The usual text of a subsidy agreement calls for the ship to service an agreed upon route for at least 70% of each year; for the remainder of the year, the ship can undertake charters or service routes to other worlds. In all cases, however, the subsidizing government is entitled to 50% of all receipts, before expenses are paid. In practice, however, the shipowner often resorts to smuggling in order to retain higher profits. Alternatively, the shipowner may sell cargo space to himself and ship speculative goods in that space rather than give up 50% of the profits on such transactions.

Variants: The low jump potential of the ship's drives has prompted the production of demountable fuel tanks for this ship. A modular 40-ton fuel tank can be installed in the cargo bay. Installation cuts off the rear doors and makes them unusable. Using these tanks, the ship can make a second one parsec jump with only a twenty hour delay. The delay is required because of standard safety checks required on the ship, and to allow pumping the fuel from the demountable tanks to the wing tanks. Fuel must be in the wing tanks for proper feed to the drives. Cargo capacity of the ship is reduced to 160 tons. The demountable tanks cost MCr.5.

It is important to remember that these demountable tanks are not collapsible. When removed or not in use, they still take up 40 tons of space, and must be stored or warehoused in some manner.

THE FAR TRADER

The basic ship involved in free trade is called the free trader. Variations on the basic ship have resulted in variations in the name. The subsidized merchant, partly because of its size, and partly because of its subsidy, is called the fat trader. Some well-equipped high-G traders employed beyond the Imperial border are called fast traders. The type A2 far trader derives its name from its jump capability: its drives are capable of jump-2, twice what the standard free trader can do.

The far trader can be encountered anywhere in the Imperium. It ranges far and wide, and deals with every world it finds. Even amber zones and red zones are not considered off limits by its captains, provided there is profit to be made and the risk of being caught is slight.

Far Trader (Type A2): Using the type 200 hull, the far trader is capable of 1-G acceleration and jump-2. Fuel tankage is 50 tons, and the ship incorporates fuel scoops for gas giant skimming. The bridge is standard and has a computer Model/I-bis installed. Two tons of fire control support the ship's two turrets. The ship has ten staterooms (three for the crew; seven for the passengers) and four low berths. A single air/raft is carried for various ship duties. The ship itself is streamlined for atmospheric landings. Cargo capacity is 61 tons.

The far trader costs MCr66.175 to construct. The price includes architect's fees and design plan costs, but does not include weaponry to be added later.

Interior Details: The far trader is constructed on a two level system. Cargo, bridge, and some drives are on the lower level; passengers, fuel, and power plant are on the upper level.

The bridge occupies the forward port section of the lower deck. Its two control positions are surrounded by transparent screens allowing a view of forward and above. Note that the lower level extends farther forward than the upper level. Behind the bridge proper is the computer room (2) and a spare stateroom. When fewer than seven passengers are carried, this stateroom is used for the crew on duty; otherwise, it holds a single passenger. A common area (5) is used for passenger reception, after which they use the lift shaft to the upper passenger deck. In flight, the common area is a crew lounge.

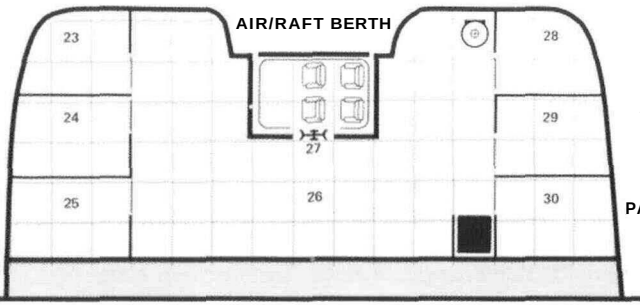
The forward starboard section of the lower deck is crew quarters. The spacious captain's cabin (22) has transparent screens along one wall and above as a skylight. Bordering the three cabins is the life support equipment and atmosphere recyclers.

Between the crew quarters and the bridge is the forward cargo loading ramp. Although this ramp and door is not equipped with an air lock, it does allow a straight vehicle approach for cargo loading on hospitable worlds.

The upper level forward is the passenger deck. Six passenger staterooms line the outer bulkheads while a large central area (26) provides recreational facilities and galley. The grav plate floor fields for individual staterooms and for sections of common area may be adjusted from 0.1 to 2.0 G, depending on the preferences of individual passengers. Centered above the cargo loading ramp is the ship's air/raft, with easy access and launch from inside the ship.

The center of the ship is occupied by the 61 ton cargo bay. Reinforced deck

Empress Marava



200-ton Far Trader

Tonnage. 200 tons (standard displacement). 2800 cubic meters.
Dimensions: 49.3 meters long by 28.5 meters wide by 8.7 meters high.
Crew: Three. Pilot/navigator, engineer, and steward/medic. In addition, two gunners may be carried as needed.
Acceleration: 2G. Normal operations and cruising at 1G.
Jump: 2. One jump-2 or two jump-1. Jump governor installed.
Power Plant; 2. Supports both maneuver and jump drives.
Engineering: Dupree drives with Halonic Duplex power plant.
Gravities: Adjustable 0.1 to 2.0 floor fields. Inertial compensators.
Range: Four weeks maneuver. One jump-2. Three months.
Cargo: Seven passengers. Four low passengers. 46 tons of cargo.
Armament: Port and starboard hardpoints, each with a dual laser turret standard. Optional weaponry available.
Electronics: Model/Ibis or equivalent. Entertainment consoles.
Ship's Boats: No auxiliary vessels. One four-passenger air/raft carried over the forward cargo loading ramp with interior boarding and access. Used for errands and has limited sub orbital capability.

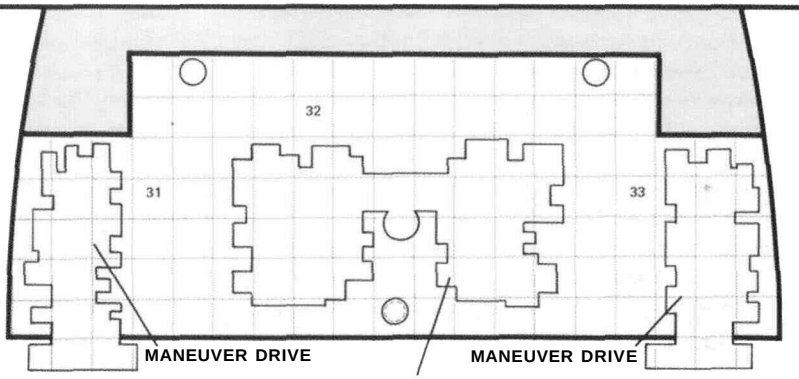
Air/ Raft

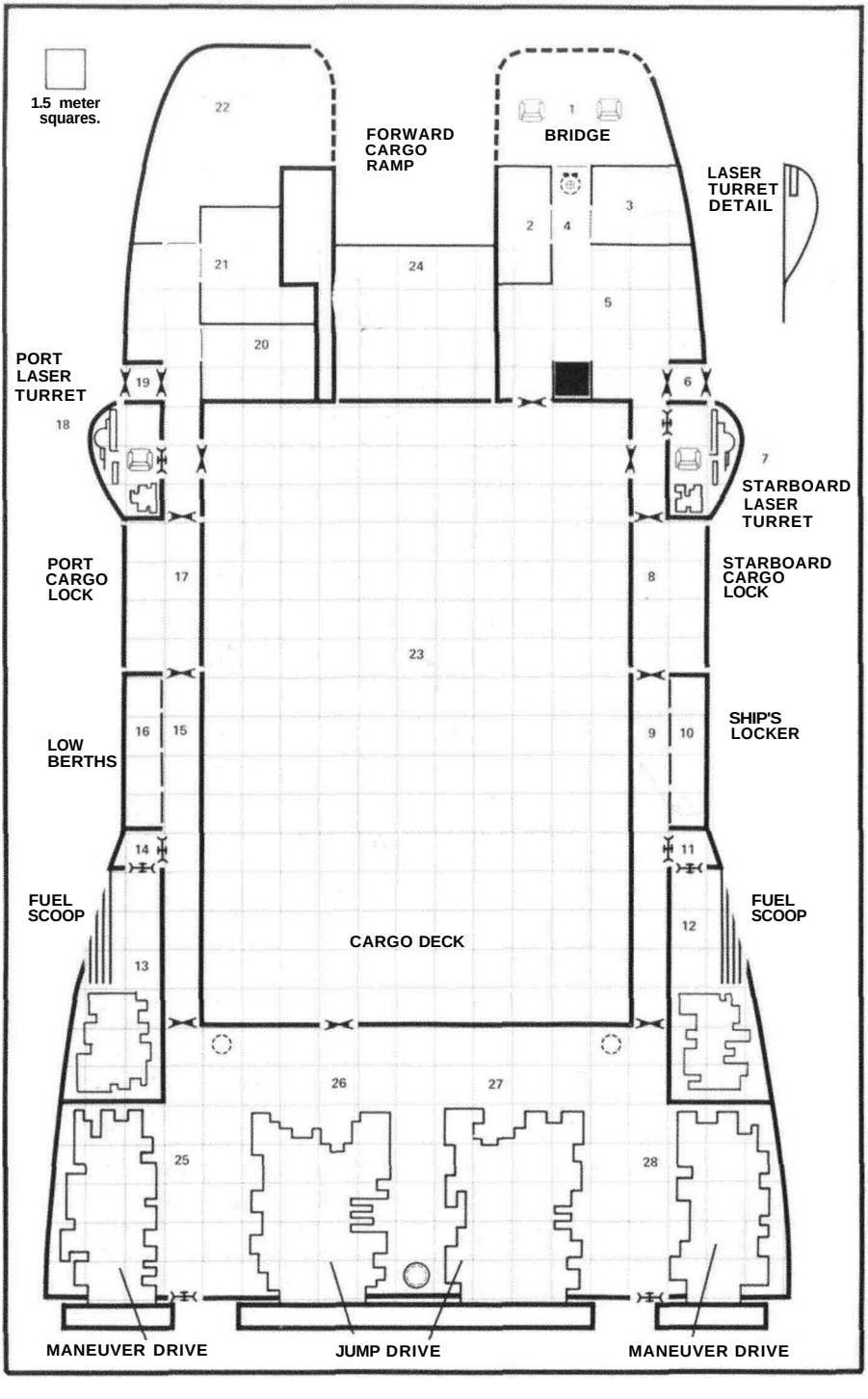
The Ling Standard Products open topped air/raft is a dependable air vehicle for the many missions and errands that must be performed by a merchant ship, but which do not call for the trouble or the expense of moving the entire ship. Passenger transfers, cargo loading, liberty runs, sales missions, and side errands all fall to the air/raft

Tonnage: 4 tons.

Cargo: 4 tons, including up to four passengers.

Performance: 100kph cruise speed. Sub-orbital position from surface in approximately six hours. Unlimited endurance.




1.5 meter squares.
FORWARD CARGO RAMP
BRIDGE
LASER TURRET DETAIL
PORT LASER TURRET
STARBOARD LASER TURRET
PORT CARGO LOCK
STARBOARD CARGO LOCK
SHIP'S LOCKER
LOW BERTHS
FUEL SCOOP
FUEL SCOOP
CARGO DECK
MANEUVER DRIVE
JUMP DRIVE
MANEUVER DRIVE
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planking and strategically placed tie-downs make the bay capable of handling modular cargo containers, palletized shipments, or individually packaged items and bulky mechanisms. Above the cargo bay is the ship's 50 ton fuel tankage.

To both port and starboard on the lower level, corridors run the length of the ship, connecting the forward control areas with the aft drive rooms. Each corridor provides access to the ship's turrets, to a cargo air lock, and to the fuel scoop and purification mechanisms. The port corridor provides access to the ship's four low berths. These low berths were originally intended for carrying livestock in the 100 to 400 kilogram range. For this reason, the berths are close to the port cargo lock, and the entire area can be sealed off with hatches and doors in the event that an animal gets loose. The starboard corridor provides access to the ship's locker, which contains the ship's armory, survival equipment, cold weather clothing, and other essential materials.

Aft, the drive rooms contain the ship's jump and maneuver drives, with the power plant mounted transversely on the upper deck.

Weaponry: The ship's two weapons turrets provide tremendous potential for armament in the event that the ship should require it. The standard weapon mix for the ship is two dual laser turrets. Gaining favor, however, among free traders is a homogeneous mix consisting of one laser, one missile rack, and one sandcaster in each turret. The result is a set of weapons that can respond to many different threats and penetrate the defenses of several different types of targets.

The Air/Raft: The ship's air/raft is a standard vehicle intended to provide the means to run small errands on planet while the ship is in port loading and unloading cargo. Massing four tons, the air/raft is an anti-gravity vehicle capable of lifting four tons, including passengers and cargo. It can achieve 100 kph as a cruise speed, with occasional bursts to 150 kph. In extreme situations, the craft can achieve sub-orbital flight, but this performance requires approximately six hours. All passengers would be required to wear vacc suits, as the air/raft is open and not pressurized.

The air/raft operates off capacitors charged from the ship's main power plant. One charge is sufficient for about one week or about 10,000 kilometers of cruising. Recharges take about two hours; since they use energy from the ship they are essentially free.

Peculiarities: The design of the far trader has ship security in mind, and so all passengers are segregated onto a passenger deck. Their access to the bridge and to other areas of the ship is limited. Unfortunately, when a seventh passenger is carried, he or she is berthed adjacent to the bridge. Original specifications did not envision more than six passengers, but the profit motive has led to them being overridden.

Costs and Revenues: The monthly payments for a ship of this type amount to Cr275,729. Further expenses for crew salaries, life support, maintenance, and berthing fees amount to Cr60,714 per month, assuming a jump every two weeks. Fuel is free for the skimming, but would add another Cr5000 per jump when its purchase is required. This type of merchant can gross approximately Cr242,000 per month, assuming a full manifest of middle and low passengers and a full cargo bay at Cr1000 per ton of cargo. Obviously, even with a full load, this ship would be unable to make its payments; it could conceivably come close to breaking even if the crew went on shares and salaries were foregone.

Instead, the owner would be required to engage in trade and speculation in order to make up the difference between what the ship normally earns and what must be paid every month. Charters might also seem an attractive alternative.

Variants: In addition to minor variations based on the ship's weaponry, one major variant has been produced — a cheaper A1 free trader with large cargo capacity. The A1 free trader is essentially identical in performance with the type A (from Book 2) but is otherwise similar to the A2. It has only four low passage berths, a computer Model/1, and jump-1, 1-G capabilities. Its cargo capacity is increased to 81 tons, primarily through a higher ceiling on the cargo bay; its fuel capacity is reduced to 30 tons, and much of the drive room becomes waste space. Cost is MCr54.5, which still cannot compete with the type A, primarily because it uses a cheaper hull configuration. Nonetheless, some of these ships can be encountered; they are externally identical to the type A2.

THE SEEKER

The search for profit prompts some into the prospecting field. While costs are high, prospecting remains an area in which a single person can find a fortune through simple hard work and patience. The seeker is an example of that effort.

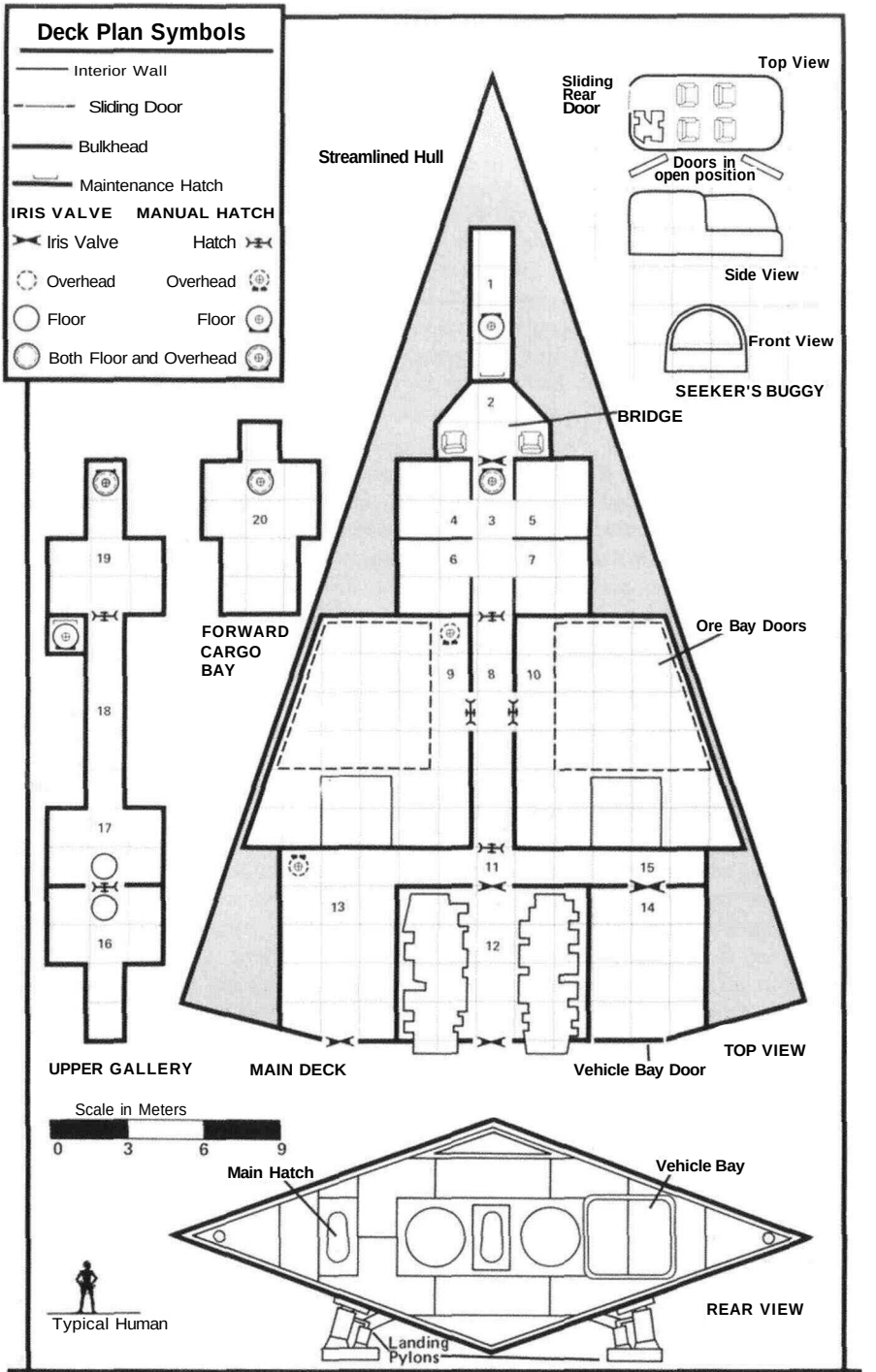
Seekers can be found in many frontier systems, especially those with low technology levels and low population. They frequent airless worlds and asteroid belts, but also search diligently on normal worlds.

Seeker (Type J): Using a surplus scout/courier as a starting point, the seeker is converted to a prospecting and mining ship for a small crew. Two of the four staterooms are removed, and the remaining two are converted to four half-sized staterooms (primarily to provide privacy for each of the crew of four). The crew consists of a pilot and three crew members, although the ship can be operated by only one person. The ship carries its original jump drive-A, maneuver drive-A, and power plant-A, which makes it theoretically capable of jump-2 and 2-G acceleration. The bridge retains the scout/courier's Model/1bis computer (and its software package) and one ton of fire control for its single hardpoint. The dual turret is fitted with a single pulse laser for use as a mining cutter. The air/raft is traded in on a prospecting buggy; a four-ton grav-powered vehicle with a pressurized cabin and provision for four people. The three-ton cargo compartment is retained, and the hull retains its streamlining. Two ore bays (ten tons each) are formed from fuel tankage, hull space, and instrumentation, reducing fuel tankage to thirty tons. Dismountable fuel tanks can be used in the ore bays to increase the fuel tankage back to forty tons, but at a reduction of ore bay tonnage to ten tons total. With normal tankage, the ship can achieve jump-1; with the dismountable tanks full, the ship can achieve jump-2.

Base price for the surplus scout/courier is MCr17; conversion costs for the seeker amount to MCr7.59, which include applicable architect's fees.

Interior Details: As much of the original scout equipment is retained as possible, if only because the instrumentation serves a prospector well in analyzing ore and geological formations. The ore bays (9 and 10) are irregular in shape, with noticeable protrusions for the ship's landing feet. The ore bay access doors are mounted on the upper side of the ship, for ease of loading when on world surfaces.

The upper gallery from the scout/courier is taken up to a great extent by the newly formed cargo bays; a small passage for the length of the ship is retained



SEEKER: Modified Scout/Courier for Mining

and allows access to the turret from the bridge and from the rear areas.

Compare the deck plan with the scout/courier deck plan on page 9 to note other differences.

Peculiarities: All seekers of this type are produced from surplus scout/couriers. As a result, the dependability of the ship is not of the highest level. The hull and drives are at least forty years old, and may be far older. Any ship of this type would do well to have a highly skilled crew capable of repairs and maintenance with a minimum of outside support.

Variants: In practice, seekers are modified by their crews almost from the start. Such variations are minor, and consist of moving partitions or walls about. Other additions which are common include exterior sling points for carrying loads, strong exterior landing lights (to illuminate mining sites in shadow), and an electrified outer hull to ward off animals on some worlds.

Seekers are also known to be in the small package trade (a euphemism for smuggling). Using their dismountable fuel tanks for greatest range, the ships carry ten tons of important (and illegal) goods such as drugs, information, or weapons.

Gunboats

Armed starships which police the space between worlds are a necessary part of interstellar civilization. These gunboats protect both the ships and the many different worlds they visit.

PATROLLING THE STARLANES

With high levels of trade between the stars, both the ships and the worlds they call on become vulnerable to a variety of ills. Merchants become the prey of pirates and corsairs. Worlds become the prey of smugglers and raiders. Huge warships built for fleet actions are nearly useless in this sort of situation, and special ships — gunboats — are designed and committed to the everyday patrols of the starlanes.

THE CLOSE ESCORT

To protect ships from the menace of pirate activity, stellar governments may require flights in convoys with armed escorts, or they may establish routine patrols in troubled areas in the hope of catching corsairs in the act. In either case, the close escort is an ideal small ship for the protection of merchant traffic.

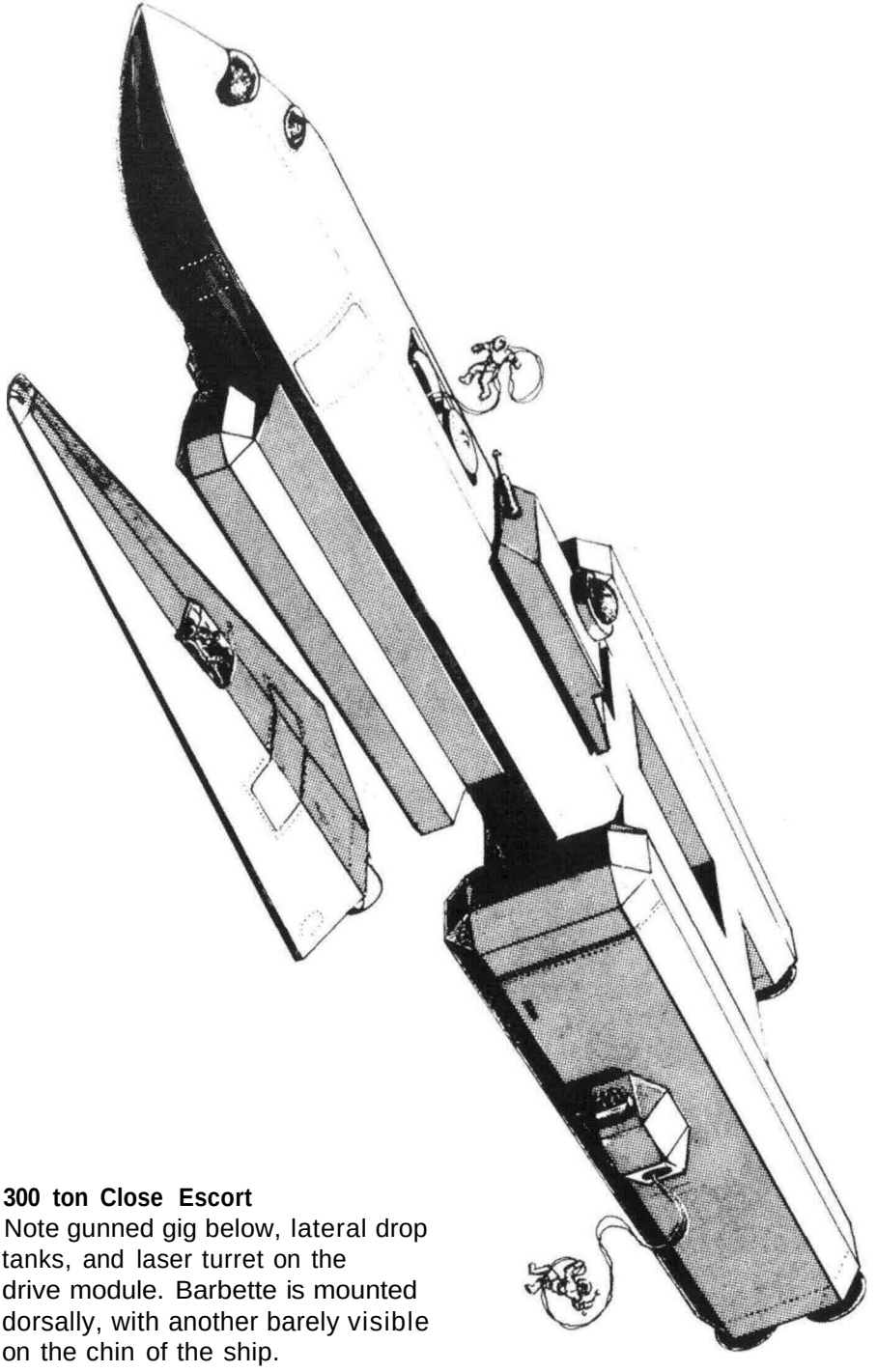
Originally, the close escort was designed and produced by the Imperium for fleet operations. The small, fast close escorts were committed as the flank screens for cruisers or small fleet task forces. Their speed and size also made them ideal for naval courier and personnel transfer duties. But ultimately, they found their true niche. Many close escorts have been assigned to specific star systems or groups of systems for commerce protection.

Close escorts may be encountered in nearly any star system, including in amber and red coded zones, protecting local merchant traffic. Because of this duty, they may be expected to stop much of the local traffic for inspection of cargo and to determine the correctness of ship's papers.

Close escorts may also be encountered in nearly any star system in convoy with merchant ships or on naval operations in a task force with larger naval ships.

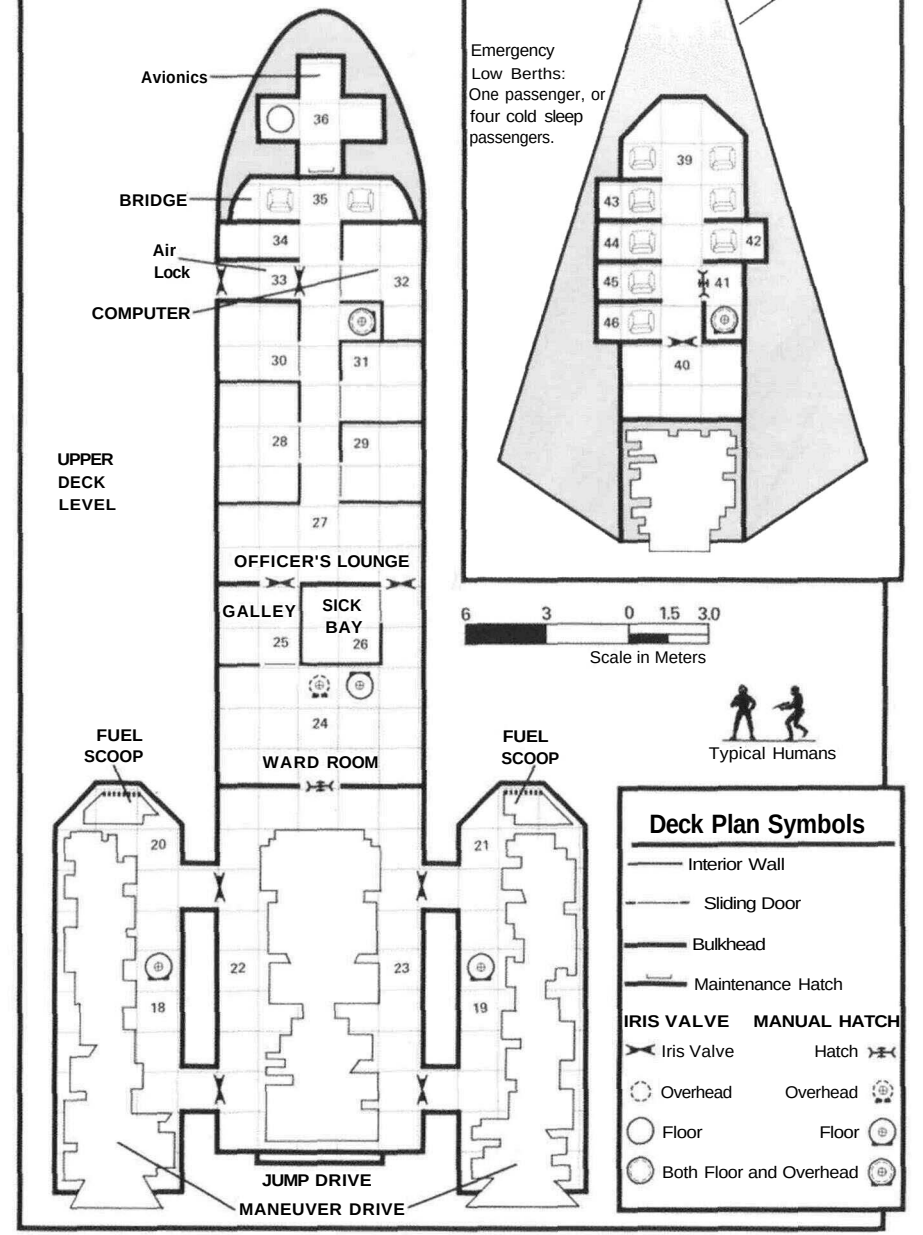
Close Escort (Type CE): The close escort is built using a 300-ton hull with a partially streamlined configuration. It is fitted with jump-5, maneuver-5, and power plant-7 drives, and fuel tankage for 81 tons of fuel. To this basic package is added disposable 100-ton fuel tanks to provide the total fuel necessary for the drives. However, with these tanks installed, the ship tonnage is increased to 400 tons, which reduces the ship's performance to 4-G, jump-4, and power plant-5. The tanks may be dropped to allow the higher performance, but the ship then becomes restricted by its lower fuel supply until the tanks are replaced. The ship has fuel scoops and a purification plant, and can refuel by skimming gas giants. The standard bridge has a Model/6 computer installed and the ship has four hardpoints. Two of the hardpoints allow five tons each, which allows the installation of particle accelerator barbettes if desired. The remaining two hardpoints sport triple laser turrets. The ship hull is heavily armored. The ship has eight staterooms, four for officers and four for double occupancy by crew members.

A 20-ton gig, itself armed with a laser mount, is slung beneath the ship, with

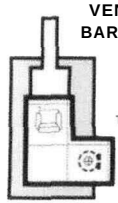


300 ton Close Escort
Note gunned gig below, lateral drop tanks, and laser turret on the drive module. Barbette is mounted dorsally, with another barely visible on the chin of the ship.

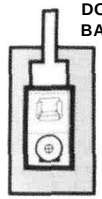
Gazelle Class
CLOSE ESCORT



Tonnage: 300 tons (special)
Dimensions: 48 meters long by 23 meters wide by 8.5 meters high.
Crew: 4 officers. 8 men. No ship's troops.
Jump: 4. In L-Hyd mode: 5, Without tanks: 2.
Acceleration: 4 G. Without tanks: 5G.
Power Plant: 5 (at 400 tons displacement). 7 (at 300 tons).
Range: Unlimited maneuver. One jump-4. 100 days.
Engineering: Two Triptic Halonic Fusion power plants coupled to one IDC FarDrive jump unit and two model 16 impulse maneuver units.
Gravitics: Inertial compensators; 1G floor field.
Electronics: ISMM Model/6.1 on board computer.
Screens: Armored hull.
Capacity: 6 tons cargo.
Armament: Dual outboard triple beam laser turrets. One dorsal and one ventral barbette; fitted with charged/neutral particle accelerators in single mounts.
Special Feature: 100-ton L-Hyd droppable tanks for greater jump range.

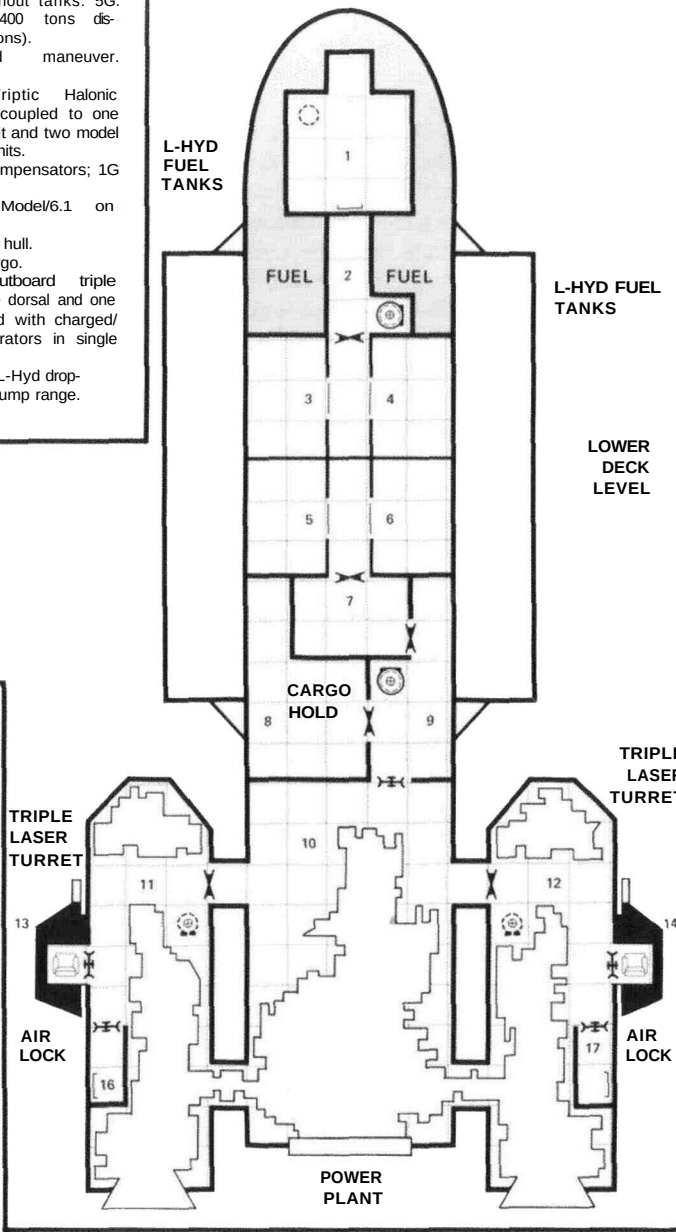


VENTRAL BARBETTE



DORSAL BARBETTE

PARTICLE ACCELERATOR BARBETTES



interlocking hatches provided. The gig is capable of 6-G and carries six acceleration couches and three emergency low berths. It can also carry two tons of cargo.

The close escort, complete with gig, costs MCr355.99. The disposable fuel tanks cost MCr.11. The gig costs MCr27.65 when purchased separately.

Interior Details: The close escort is constructed on two levels with a half-level sandwiched between to carry the main fuel tankage. The upper level contains the bridge, officers quarters, galley, sick bay, and maneuver and jump drives. The lower level contains crew quarters, cargo hold, and power plant.

The lower level is cushioned at the nose by fuel and avionics installations (1). Crew staterooms (3, 4, 5, and 6) are intended for double occupancy. A crew common room (7) is intended for recreation and crew meals. A reception passage (9) allows access to the ship's gig, which is carried in brackets on the ventral surface. A hatch also leads up to the second level.

The upper deck level contains the bridge and forward avionics. Directly behind the bridge are the computer (at 32) and the ship's locker (34). A lateral air lock for passenger transfers is at location 33. Officers' cabins, intended for single occupancy, are sited at 28, 29, 30, and 31; 28, the largest, is generally used for the captain.

Behind a lateral bulkhead are the small galley and sick bay, both opening onto the ward room.

The aft portion of the ship contains the drives. Centered in the ship is the jump drive and parts of the power plant, while the maneuver drives and the remainder of the power plant are carried in lateral pods attached with bracing and personnel passages.

An important aspect of the ship is its interior layout; the ship was designed at a time when mutinies were a major threat to security. As a result, major bulkheads break up the ship into distinct areas — some for crew members, some for officers, and some common to both.

Weaponry: The ship mounts four weapons installations. A particle accelerator barbette is mounted ventrally forward in *a* chin mount, while another is placed dorsally in the midsection. Each fires a beam of charged or neutral particles for radiation damage to targets. Port and starboard on the drive modules, the ship mounts two high power triple laser turrets, fired from within the turret by a trained gunner.

The L-Hyd Tanks: The close escort carries a large fraction of its fuel in droppable tanks mounted longitudinally. With the tanks attached, the ship is capable of jump-4 and 4-G acceleration. When the tanks are dropped, the ship burns the fuel and can achieve jump-5. Once the tanks are dropped, they must be replaced at a starport or naval base; until they are replaced, the ship is capable of 5-G acceleration, but only jump-2 (due to lack of sufficient fuel capacity).

The Gig: The close escort is partially streamlined and can skim gas giants for fuel. It cannot, however, land on worlds with atmospheres. To this end, the ship carries a 20-ton gig. It is capable of 6-G acceleration, and is armed with a single laser battery. In addition, the ship carries three emergency low berths (with a total capacity for 12) which allows the gig to be used as a lifeboat when necessary.

Variants: The only major variant of the close escort is the gunned escort, a streamlined version with no other noticeable changes. This ship looks similar to the scout/courier, with only portions of the basic hull outline bulging above the plane surfaces. The gig nestles neatly beneath the ship. Finally, the L-Hyd tanks are

not droppable, and the ship is restricted to ordinary performance.

Naming: Most close escort ships of the type illustrated are of the *Gazelle* class. The first ship of class was named the *Gazelle,* and those which followed carry names of fast herbivores, including *Reindeer, Kudie* (for Kudebeck's Gazelle), *Kangaroo, Tommy,* and *Lunger.*

Ships of the major variant type, the gunned escort, are of the *Fiery* class, named for energetic adjectives. Names include *Fiery, Explosive, Active,* and *Bright.*

THE SYSTEM DEFENSE BOAT

The term *boat* means a non-starship, whether a gunboat, a ship's boat, or a system defense boat. Because non-starships can allocate more tonnage to power plants and weaponry, they can usually defeat a starship of equal tonnage. From this principle, the concept of the system defense boat has evolved. Fleets of such boats are stationed in important systems and charged with their defense. From stations in orbit, they defend the primary world. From stations deep within the local gas giant, they attack enemy ships in the process of refuelling. In extreme situations, they can scatter and hide, in asteroid belts, on airless worlds, and in the depths of oceans; later they strike out again, hitting the enemy from the rear or when least expected.

Finally, such system defense boats are also used for routine duties such as customs inspections, piracy suppression, and search and rescue.

System Defense Boat (Type SB): Using the type 400 hull, the system defense boat is equipped with ten staterooms (allowing a crew of ten); no low berths are fitted. The crew consists of a pilot, navigator/medic, chief engineer and five engineers, and two gunners. The ship has drives capable of 6-G, but no jump capability. The bridge has a very powerful Model/5fib computer, with standard software package. Four tons of turret fire control are allocated— two triple missile turrets and two triple laser turrets. The hull is streamlined and heavily armored.

The total cost for a system defense boat of this type is MCr777.54.

Interior Details: The entire system defense boat is fitted snugly into an alloy hull with compartmentalization for the various ship functions. Fuel buffers surround the ship for greater damage control. Mounted aft are the drive room and the maneuver drives for the ship; integral power plants are included. Occupying the center of the ship are large missile magazines which hold additional ammunition for the ship's missile racks. Above and below are laser turrets, but the gunner couches for all weaponry are hidden within the ship on the lower deck (21 and 22).

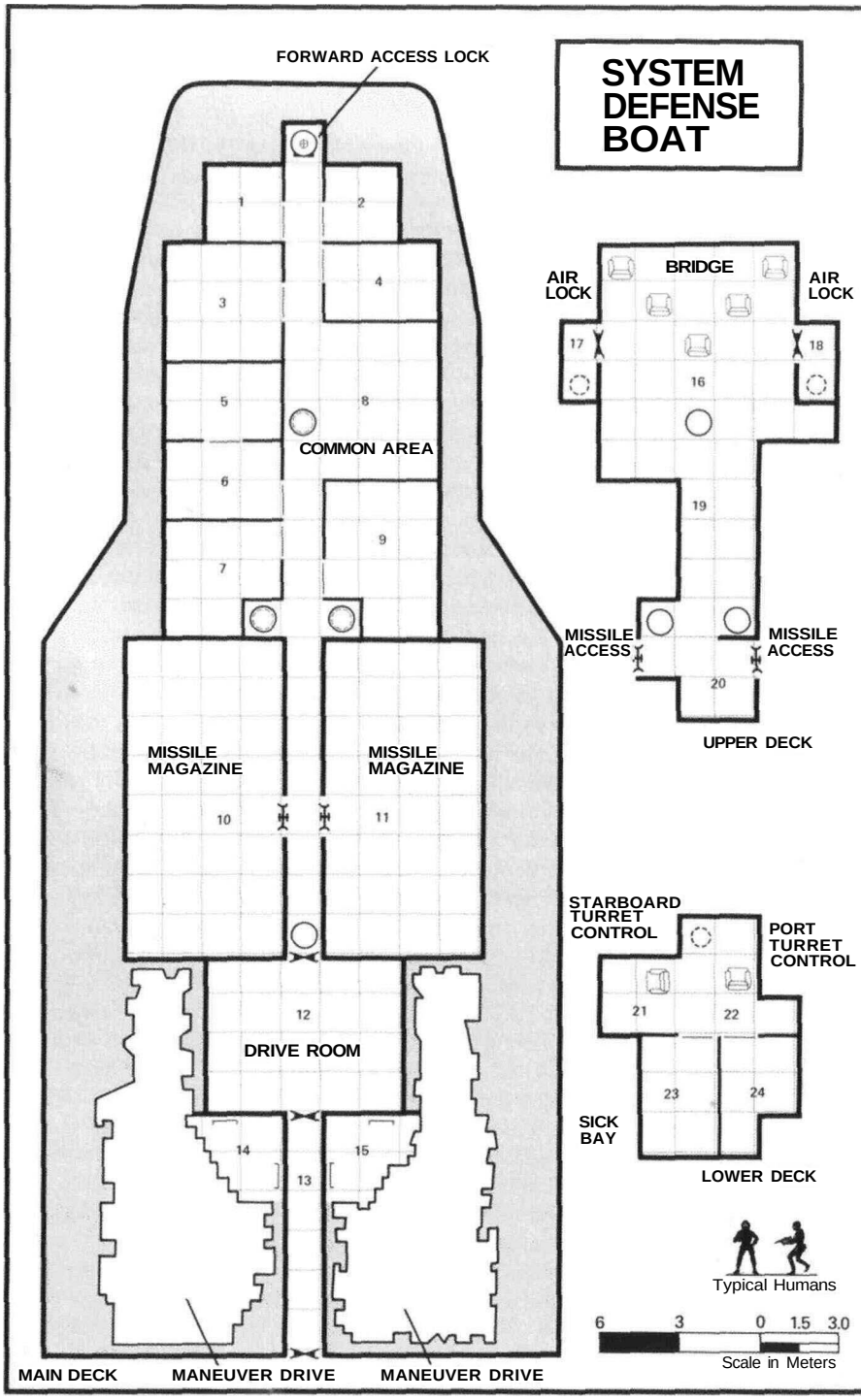
The upper deck contains the bridge and access points to the various missile equipment. It also contains lateral air locks for access to the exterior.

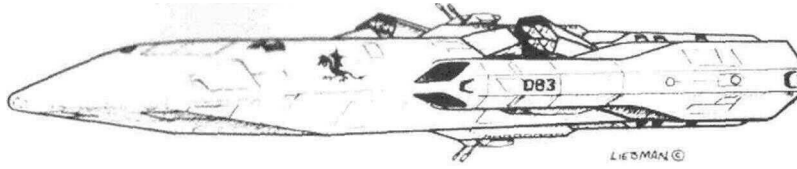
The main deck, sandwiched between the upper and lower decks, contains crew quarters, a galley (4), and a common or recreation area (8).

Employment: The system defense boat is used by most stellar systems which are vulnerable to attack or which consider that they have something which is worth defending. In general, a few system defense boats are visible in such a system for show; the majority remain on station for long periods of time and return to a planetary base only after being relieved.

Typically, SBs are deployed in five general areas: the comet belt, the gas giant, the asteroid belt, near the major world, and on the major world.

System defense boats in the comet belt are in deep reserve, committed to attacks on invading ships if possible and to guerrilla-type raids if the invader


SYSTEM DEFENSE BOAT
FORWARD ACCESS LOCK
1
2
3
4
5
6
7
8
9
COMMON AREA
MISSILE MAGAZINE
MISSILE MAGAZINE
10
11
12
DRIVE ROOM
13
14
15
MAIN DECK
MANEUVER DRIVE
MANEUVER DRIVE
BRIDGE
AIR LOCK
AIR LOCK
16
17
18
19
20
MISSILE ACCESS
MISSILE ACCESS
UPPER DECK
STARBOARD TURRET CONTROL
PORT TURRET CONTROL
21
22
23
24
SICK BAY
LOWER DECK
Typical Humans
6 3 0 1.5 3.0
Scale in Meters



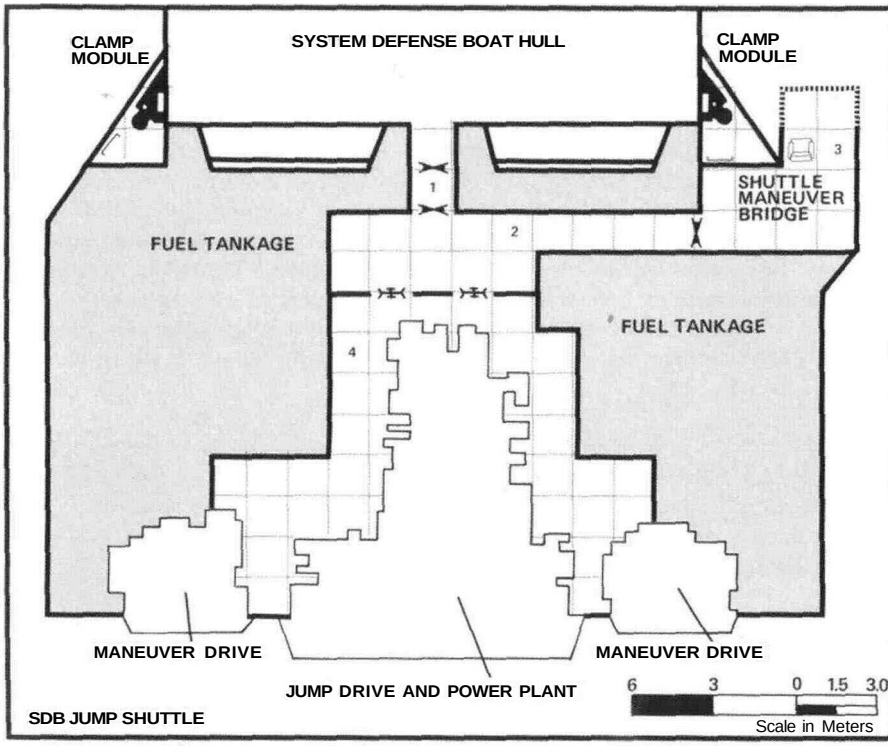
A Tech 12 400-ton System Defense Boat

succeeds in entering the star system.

The local gas giant is another site for SB deployment. Boats are actually placed deep within the gas giant itself, and are poised to attack enemy ships in the process of refuelling. Even if invading ships then succeed in taking the region of the gas giant and establishing a refuelling foothold in the system, they must still contend with system defense boats lurking within.

The asteroid belt provides camouflage for system defense boats, allowing them to lie quiet and unmoving for long periods of time. When enemy ships present themselves, the boats can dash out for the kill and then retreat quickly to the protection of the belt. Caches of supplies and fuel are often prepositioned in the asteroid belt for later rendezvous by system defense boats.

The remaining system defense boats in a system are positioned around the major world. Many of them occupy close orbits and are routinely committed to anti-smuggling duties; additional boats are assigned to far orbit and maintain safety or rescue operations. The remainder are on long-term station on the world itself itself. If the world has any large bodies of water at all, the system defense



boats stationed on it will be based in the water. Because this water is reasonably opaque to most sensors (and thus provides ready concealment), system defense boats stand on station in the ocean depths, often connected to in-place sensor arrays or alert systems. They are hidden until needed; they are ready to act at a moment's notice. By necessity, system defense boats are built to take the pressures of ocean depths and to operate without problems in such environments.

The Jump Shuttle: System defense boats have no jump drives and are incapable of interstellar flight. To enable the transfer of these gunboats to systems in need of them, a jump shuttle has been produced which carries fuel and jump drives for such transfers. Alone, the 200-ton jump shuttle can achieve 3-G and jump-2 and carries fuel tankage for three consecutive jumps. It carries a crew of three. When connected to the system defense boat, its powerful jump drives are reduced in capacity, but can still propel the combination to jump-1 and 1-G maneuvers. Its fuel capacity remains enough for two consecutive jumps.

When mated, the two craft have access ways to allow intermingling of the crews of each ship. The primary problem with such connections is that a period of several hours is necessary to connect or disconnect the craft; the jump shuttle is not an ideal way to transfer system defense boats to a system where there is action currently going on.

The jump shuttle costs MCr93.52 and displaces 200 tons. In practice, one jump shuttle is provided for each ten system defense boats, in situations where interstellar capability is required.

Variants: A wide variety of system defense boats exist, ranging in tonnage from 100 to 1000 tons, and in tech level from 8 to 15 and above. The ship illustrated here is only one of many different types.

Small Craft

Plying the lanes between the planets are the small craft which run errands, make small deliveries, and generally do much of the dirty work that the larger craft can't or won't do. Small craft mass less than 100 tons and are incapable of interstellar flight. They are usually classified by tonnage, although variations sometimes make identification difficult. Launches are in the 20-ton range; ship's boats are in the 30-ton range, pinnaces are in the 40-ton range, and cutters are in the 50-ton range. Shuttles may vary from 30 to 90 tons. The small craft described here are typical interplanetary vessels; they should not be construed as the only types available, as shipyards can construct most anything that can be designed.

All of the small craft shown here carry acceleration couches for two crew members on the bridge. In practice, it is possible to operate the craft with only one person (the pilot); the other couch may be used by a co-pilot, or it may be allocated as an additional passenger seat.

THE LAUNCH

The launch is a 20-ton vessel intended for small, routine errands in interplanetary space. It is capable of 1-G acceleration, and is constructed at tech level 8. The bridge contains couches for two crew members (location 8). An air lock (9) and a fresher (10) are located behind the bridge.

Once the basic requirements for drives, bridge, and fuel are met, the 20-ton launch has 13 tons remaining. A typical craft will divide this 13-ton payload into six passenger couches (3 tons), six tons of cargo hold, and four additional tons of cargo space. The craft is unarmed, and Costs MCr14.

Two well-known variations of the launch are the gig and the lifeboat.

The gig is generally armed, carrying one laser mounted forward. It carries a computer Model/1 to assist in firing the laser. The tonnage required for the weaponry reduces the gig's fuel tankage to 3 tons. The gig costs MCr17.

The lifeboat is intended for survival needs of a larger ship, although it also retains its ability to carry cargo and goods, or to run errands for its parent ship. The lifeboat carries six emergency low berths, three tons of cargo, and five tons of fuel. The large fuel capacity is carried for survival and endurance reasons. The emergency low berths provide acceleration couches for six passengers in ordinary use while quadrupling the lifeboat's capacity to 24 in emergencies. The lifeboat costs MCr14.

THE SHIP'S BOAT

The ship's boat is a small vessel ordinarily carried to perform odd jobs and minor operations for a larger ship. It is incapable of interstellar flight, but can achieve 6-G in interplanetary space. It masses 30 tons and is constructed at tech level 9. The bridge contains acceleration couches for the crew members (location 22). An air lock (23) and a fresher (25) are located behind the bridge.

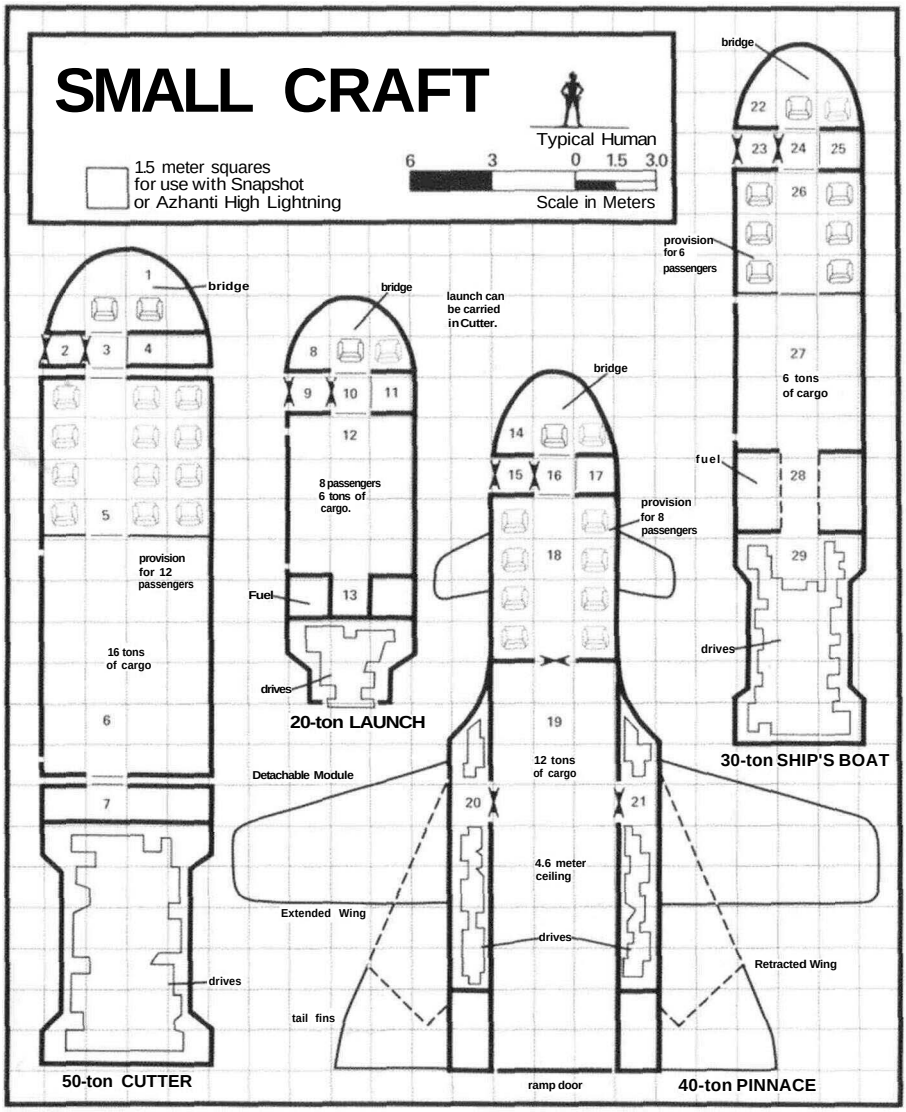
Once the basic requirements for drive, fuel, and bridge are met, the ship's boat has 13.7 tons remaining for other purposes. A typical craft will have six accel-

eration couches (3 tons), six tons of cargo, and 4.7 additional tons of fuel. It costs MCr16.

THE PINNACE

The pinnace is a larger, farther-ranging non-starship. It masses 40 tons and is constructed at tech level 9. The model shown in the deck plans is capable of carrying an all terrain vehicle as well as passengers.

Once basic requirements for drives, bridge, and fuel are met, the pinnace has 22.4 tons remaining. A typical pinnace will then be fitted with eight passenger



acceleration couches, 6.4 additional tons of fuel tankage, and a cargo hold for twelve tons. A rear door allows loading and unloading of an ATV when it is carried, as well as allowing easy access to cargo being carried. The pinnace costs MCr20.

The pinnace in the deck plans is streamlined for maximum efficiency in atmospheric landings. Location 14 is a bridge with provision for two crew members. A fresher (17) is located directly behind the bridge, convenient to both crew and passengers. The pinnace's drives are located outboard (21 and 22) with access from the cargo compartment.

Unusual on this model is the provision for mounting of "stern-chaser" weaponry. The open hull spaces (adjacent to the rear ramp door) normally carry fuel. Fuel tonnage may be reduced by one ton to allow installation of dual lasers or missile racks aimed aft. This configuration is common on merchant-operated pinnaces, either as protection against corsairs, or for use by smugglers as protection against enforcers.

This pinnace is also unusual in its use of a retractable wing configuration in its streamlined hull. The wing allows greater efficiency in maneuver.

THE CUTTER

The cutter is one of the larger of the small craft, massing 50 tons and costing MCr 28. It is constructed at tech level 9. Typically, cutters employ a modular design with a basic hull fitted with drives, fuel, and bridge, and massing approximately 20 tons. The basic hull also contains acceleration couches for two persons, an air lock (2), and a fresher (4). The remaining 30 tons is allocated to a cylindrical module which may be fitted out in a number of ways. A typical module has twelve acceleration couches (6 tons), fifteen tons of cargo hold, and an additional nine tons of fuel tankage. Other modules may carry all fuel (30 tons), all cargo (30 tons), or even all passengers (60).

Starship Encounters

Starship encounters using the ships in this supplement can occur in a variety of star systems and can involve any of this booklet's ships.

There is a relatively good chance of a starship encounter in most any star system. Roll two dice and impose an encounter on a result of 6+. If an encounter is dictated, determine which table is used by the following method. Roll one die; the result is the number of the encounter table to be used. If the star system in which the encounter is to occur does not have an express boat route into or through it, apply a DM of +1 to the die roll. If only ships from this supplement are to be used for encounters, ignore encounter table 2 by substituting table 3 in its place.

On the encounter tables, a two dice roll is required. The roll then indicates the type of ship encountered. Each table also indicates the probabilities of specific types of missions the encountered ship may be performing. The types of missions involved are indicated below.

Any mission may be routine or Imperial. A routine mission is otherwise unremarkable and the ship will have time to converse by communicator or through an exchange of visits. Imperial missions consider time to be extremely important, and will tend to be brusque and uncommunicative.

Communications missions involve the carriage of information and generally involve the express boat network. Courier missions are similar but carry goods or personnel to specified destinations.

Trade missions involve the speculative carriage of goods. Transport missions involve the carriage of goods in return for cargo fees. Trade and transport missions are a combination of both. Smuggling missions involve the carriage of contraband; such missions will treat themselves as transport missions whenever possible and will avoid betraying their true nature.

Patrol missions involve brief calls at worlds and bases to ascertain that there is no problem or trouble that the ship should respond to. Escort missions involve a ship actively travelling in company with other ships to protect them. Transfer missions involve a ship moving from one system to another after completing a mission, but before beginning a new mission.

Fleet maneuver missions involve more than one ship (generally navy) in practice operations or actual combat operations.

Survey missions are slow and plodding examinations of systems to determine new data or to correlate old data. Such missions may take weeks or months and the crew of a ship performing this mission will be very communicative, actively seeking visitors as well as local information.

The referee using these encounter tables should keep in mind that these tables are not immutable; they are intended to provide a basis for starship encounters. Similar tables may be constructed for use in specific star systems, or these tables may be modified to better reflect any specific region of the referee's campaign.

Additional tables may also be produced to reflect starships which the referee has designed; populating star systems with these ships will lend character to the systems and to the referee's campaigns.

1. EXPRESS BOAT NETWORK

Encounter occurs involving 8 component of the Imperial express boat network in a star system which is along a route of the network. Ships will consider themselves on Imperial communications missions on a roll of 7+; otherwise, they are on routine communications missions.

Die Ship Encounter

2 Scout/courier carrying passengers.
3 Scout/courier travelling empty.
4 Scout/courier travelling empty.
5 Express boat tender standing by for arriving express boat.
6 Express boat leaving system.
7 Express boat awaiting orders to leave system.
8 Express boat arriving in system.
9 Express boat tender standing by for arriving express boat.
10 Express boat tender arriving with cargo of several (1 to 4) express boats.
11 Express boat tender leaving with cargo of several (1 to 4) express boats.
12 Express boat and tender together refuelling and refitting.

2. LARGE MISCELLANEOUS VESSELS

Encounter occurs in any system. Ships on this table may not be described in this supplement; substitute table 3 if the referee so desires.

Ships may be on a variety of missions selected from the following (as appropriate): communication, trade, transport, survey, patrol, escort, transfer, and fleet maneuvers.

Die Ship Encounter

2 Pinnace (from *Kinunir* class battle cruiser; see Adventure 1 for details of ship and performance; parent ship also insystem).

3 Fuel shuttle (from *Azhanti High Lightning* class frontier cruiser; see Game 3 for details of ship and performance; parent ship also insystem).

4 Lifeboat (from *Leviathan* class merchant cruiser; see Adventure 4 for details of ship and performance; parent ship insystem). This boat may be indicative that its parent ship is in distress; it may also be a decoy to draw a target closer to its parent ship, whereupon it will turn corsair.

5 *Kinunir* class battle cruiser (see Adventure 1 for details of ship).

6 Fighter (from *Shivva* class patrol frigate) intruding on Imperial space (see Adventure 4 for details of ship and performance; parent ship also insystem).

7 *Azhanti High Lightning* class frontier cruiser (see Game 3 for details of ship and performance; subordinate craft and several close escorts also present insystem).

8 *Leviathan* class merchant cruiser (see Adventure 4 for details of ship).

9 *Kinunir* class battle cruiser (see Adventure 1 for details of ship).

10 Fighter (from *Azhanti High Lightning* class frontier cruiser; see Game 3 for details of ship and performance; parent ship also insystem). This ship may be involved in clandestine survey, smuggling, or fleet maneuvers.

11 *Kinunir* class battle cruiser (see Adventure 1 for details of ship).

12 Shuttle (from *Leviathan* class merchant cruiser; see Adventure 4 for details of ship and performance; parent ship present insystem).

3. MERCHANT ENCOUNTERS

Encounter occurs in any system. If the system is only accessible by jump-2, apply a DM of +4. If other peculiarities of jump access apply, the referee must modify the table or the encounters.

Ships on this table will be involved in trade missions on 5-; trade and transport missions on 6 to 8; transport missions on 9+. In addition, ships will be involved in smuggling on 3- and on 11+.

The distress call may emanate from any ship on the list, or from any ship on any other encounter table. It may be legitimate, or it may be a decoy to lure a ship to a pirate or corsair; corsairs are generally produced from ship types SB, CE, or XT.

The seeker may be involved in trade or in prospecting. If prospecting, the ship will frequent the asteroid belt of the system or one of its more desolate worlds.

Die	*Ship Encounter*
2	Free trader (type A1) leaving system.
3	Subsidized merchant (type R) on subsidized merchant route.
4	Subsidized merchant (type R) on charter.
5	Distress call: roll again for specific ship.
6	Subsidized merchant (type R) on free trade status.
7	Seeker (type J). This ship may be on a trade mission or may be prospecting.
8	Free trader (type A1) entering system.
9	Far trader (type A2) leaving system.
10	Far trader (type A2) entering system.
11	Seeker (type J). This ship may be on a trade mission or may be prospecting.
12	Far trader (type A2) entering system.

4. GUNBOATS

This encounter may occur in any system. The ship involved is one from the Imperial (or other) Navy. Ships on this table will be performing one of the following missions: patrol, escort, transfer, fleet maneuver, or courier.

If the fleet maneuver mission is selected, the number of ships involved should be increased to a minimum of five in order to achieve the feel of a fleet in action.

Ships on patrol may be expected to stop any ships encountered and question or inspect them for legal or enforcement purposes.

Die	*Ship Encounter*
2	Close escort (type CE).
3	Two close escorts (type CE).
3	Two close escorts in task force on routine patrol.
4	Gunned gig from a close escort (parent close escort also present insystem).
5	Three close escorts (type CE).
6	System defense boat (type SB).
7	System defense boat (type SB).
8	Subsidized merchant (type R) operating as naval auxiliary.
9	Jump shuttle for system defense boat operating alone.
10	Close escort (type CE).
11	Two system defense boats (type SB).
12	System defense boat and jump shuttle operating together.

5. SMALL CRAFT

This encounter may occur in any system. Small craft may be operating on an interplanetary basis from local worlds, or they may be operating from a starship parent.

Small craft may be performing any of the following missions: courier, survey, courier, transport, trade, or smuggling. The courier mission may be interpreted as a form of errand-running.

Die	*Small Craft Encounter*
2	Ship's boat.
3	Pinnace.
4	Cutter.
5	Launch.
6	Launch from subsidized merchant (type R).
7	Pinnace.
8	Cutter.
9	Launch.
10	Pinnace.
11	Ship's Boat.
12	Gunned gig from close escort (type CE).

6. FRONTIER ENCOUNTERS

This encounter may occur in any system, but is preferred to occur in low technology, low population systems, or those with travel codes red or amber.

Die	*Ship Encounter*
2	Scout/courier in private hands on a corporate routine survey mission.
3	Scout/courier on Imperial communications mission.
4	Scout/courier on routine survey mission.
5	Seeker (type J) involved in prospecting.
6	Seeker (type J) on trade mission (also smuggling on 9+).
7	Express boat tender on transfer mission.
8	Express boat tender in private hands operating as a corsair.
9	Subsidized merchant (type R) on Imperial transport mission.
10	Distress call: roll again for ship type.
11	Close escort in private hands and operating as a corsair.
12	Express boat in distress. Roll one die minus two for the number of days of oxygen and water the pilot has left. If the result is negative, he is probably dead. If the result is zero, he must be rescued within a few hours.

High Guard Statistics

The starships and spacecraft which appear in the pages of this supplement have been evaluated and rated using the second edition of *High Guard* (Traveller Book 5) in order to provide Universal Ship Profiles (USPs) for each. The information provided below should be sufficient to allow combat between these ships and any player-character owned vessels which have also been *High Guard* rated. Such combat may include piracy, pitched battles, or simple encounters gone wrong.

In many cases, several different versions of the ship have been shown, with the variations being in installed weaponry. The first listing in each case is an unarmed example; additional listings show a variety of weaponry arrays. For characters interested in their own weaponry schemes, the unarmed version can be easily upgunned.

In cases where the ship has accompanying small craft, those craft are listed complete with their own *High Guard* rated USPs and other data immediately following the parent ship.

TYPE X EXPRESS BOAT

X-51216 Express Boat	X-1540041-000000-00000-0	MCr70.65	100 tons
Book 2 Design			Crew=1.TL=10.

Passengers=1 (possible). Low=0. Fuel=40. Cargo=1 (possible). EP=0. Agility=0.

TYPE XT EXPRESS BOAT TENDER

XT-8795 *Winston*	XT-A411132-000000-00000-0	MCr274.77	1000 tons
XT-8796 *Purcell*	XT-A411132-020000-30002-0	MCr280.17	1000 tons
XT-8797 *Marabi*	XT-A411132-000000-30000-0	MCr283.87	1000 tons
batteries bearing	3		Crew=6. TL=10.
batteries	3		Book 2 Design.

Passengers=4 (10 if double occupancy). Low=20. Cargo=60. Fuel=150. EP=10.

TYPE S SCOUT/COURIER

S-16785 *Central Axis*	S-12222R1-000000-00000-0	MCr27.63	100 tons
S-16786 *Duplicity*	S-12222R1-000000-20000-0	MCr29.43	100 tons
S-16787 *Restraint*	S-12222R1-000000-00001-0	MCr28.305	100 tons
Book 2 Design.			Crew=1.TL=9.

Passengers=7. Fuel=40. Cargo=3. EP=2. Agility=2. Hardpoint=1. Air/Raft=1.

TYPE A2 FAR TRADER

A-8456 *Empress Nicholle*	A2-22211R1-000000-00000-0	MCr59.56	200 tons
A-8457 *Empress Marava*	A2-22211R1-010000-10001-0	MCr61.36	200 tons
A-8458 *Empress Margaret*	A2-22211R1-000000-30000-0	MCr64.96	200 tons
batteries bearing	3		Crew=3. TL=9.
batteries	3		Book 2 Design.

Passengers=6. Low=4. Cargo=61. Fuel=50. Hardpoints=2. Agility=0.

TYPE R SUBSIDIZED MERCHANT

R 80198 *Gyro Natchel* R-4211111 000000 00000 0 MCr100.035 400 tons
R-80199 *Gyro Cadis* R-4211111 000000 10001-0 MCr101.61 400 tons
Book 2 Design. Crew=5. TL=9.
Passengers=8. Low=9. Fuel=50. Cargo=200. EP=1.5. Hardpoints=2. Agility=1.

R80199.1 *Assistant* LB-0101101-000000-00000-0 MCr14 20 tons
Crew=1. TL=9. Passengers=8. Cargo=9. Fuel=1. EP=.4. Agility=1. Bridge.

TYPE J SEEKER

J-6170A *Jupiter* J-12222R1-000000-10000-0 MCr24.19 100 tons
Book 2 Design. Crew=1.TL=9.
Passengers=3. Cargo=33. Fuel=30. Hardpoint=1. EP=2. Agility=0. Pulse Laser.
One prospecting buggy. Fuel may be increased 10 tons at the cost of cargo space.

TYPE CE CLOSE ESCORT

CE-13712 *Gazelle* CE-3455762-300000-500004-0 MCr353.19 300 tons
CE-13768 *Unicorn* CE-3455762-300000-401000-0 MCr355.99 300 tons
batteries bearing 2 2 Crew=12.
batteries 2 2 TL=14.
Passengers=0. Low Berths=0. Cargo=6. Fuel=81. EP=21. Agility=0. Troops=0.
Note: L-Hyd tanks add 100 tons of fuel and mass (CE-4444762) and Cost MCr.11.

GG-13768.1 Gig GG-0106B21-000000-20000-0 MCr27.65 20 tons
Agility=6 one battery. Crew=1. TL=14.
Passengers=7. Emergency Low Berths=3 (for 12). Cargo=2. Fuel=2.2. EP=2.2.

TYPE SB SYSTEM DEFENSE BOAT

SB-98076 *Guardian* SB-41069E2-900000-40003-0 MCr777.54 400 tons
Crew=10. TL=12. Passengers=0. Cargo=27. Fuel=36. EP=36. Agility=6.

WP-768 Jump Shuttle WP-24323S1-000000-00000-0 MCr93.52 200 tons
Crew=3. TL=12. Passengers=0. Low=0. Cargo=0. Fuel=126. EP=6. Agility=1.
Ship/Shuttle WP-61111S1-000000-00000-0 MCr- 600 tons
Crew=3. TL=12. Passengers=10. Low=0. Cargo=27. Fuel=126. EP=6. Agility=0.

SMALL CRAFT

Launch QL-0201101-000000-00000-0 MCr14 20 tons
Crew=2. Passengers=6. Cargo=6. Fuel=5. Agility=1. TL=8.

Ship's Boat QB-0206601-000000-00000-0 MCr16 30 tons
Crew=2. Passengers=6. Cargo=6. Fuel=6.5. Agility=6. TL=9.

Pinnace KK-0105501-000000-00000-0 MCr20 40 tons
Crew=2. Passengers=8. Cargo=12. Fuel=8.4. Agility=5. TL=9.

Cutter YY-0204401-000000-00000-0 MCr28 50 tons
Crew=2. Passengers=12. Cargo=15. Fuel=13.5. Agility=4. TL=9.

Using The Deck Plans

The ship deck plans in this supplement are adapted to use in a wide variety of **Traveller** situations and adventures. In addition to general use, the following specific situations in published materials are suggested.

Scout/Courier: This ship can be used as the mustering out benefit for scout characters as allowed in Book 1 and described in Book 2. A scout/courier is also called for in Double Adventure 1 — *Shadows,* and Double Adventure 2— *Mission on Mithril.* Scout ships in wrecked condition are possible in Adventure 3— *Twilight's Peak.*

Far Trader: The A1 version of this ship may be used as a mustering out benefit for characters as allowed in Book 1. Either the A1 or the A2 version of this ship may be used as the merchant ship in Double Adventure 1— *Annie Nova.* The A2 version is ideal as the characters' ship in Adventure 3— *Twilight's Peak.*

Subsidized Merchant: The type R merchant is identical to the wrecked merchant from the epic in Adventure 3— *Twilight's Peak.*